



Public Utilities

FORTNIGHTLY



July 3, 1941

THE UTILITIES AND THE WAR

By Herbert Corey

“ ”

Thinking Ahead of Disaster

By James H. Collins

“ ”

Defense for the Utilities

By Andrew Barnes

1053

**PUBLIC UTILITIES REPORTS, INC.
PUBLISHERS**

WHAT, MR. AMPS, DO YOU DRINK FOR BREAKFAST?



Coffee! You bet it's coffee. You wouldn't be without your morning cup. And 97% of all American families feel the same way, drink coffee at least once a day.

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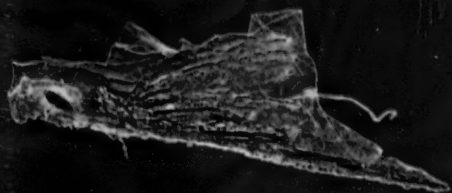


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A CONTROL device of such importance as a gas pressure regulator **MUST** be highly reliable and positive in operation. BARBER Regulators are of approved design, and so long and thoroughly tested under actual service conditions, that leading gas authorities are satisfied to recommend them to their customers. For safety, uniform appliance performance, and genuine fuel economy—you are justified in recommending Barber Regulators to dealers and consumers whom you serve. Built for long life, and dependable in operation—with all-bronze bodies, brass operating parts, phosphor bronze springs, non-deteriorating diaphragms. Responsive to 3/10 pressure variation. Give your customers the better value of Barber Regulators.

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ber Burners For Warm Air Furnaces, Steam and Hot Water Boilers and Gas Appliances

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Financial Editor—OWEN ELY

Public Utilities Fortnightly



VOLUME XXVIII

July 3, 1941

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Q This magazine is an open forum for the free expression of opinion concerning public utility regulation and allied topics. It is supported by subscription and advertising revenue; it is not the mouthpiece of any group or faction; it is not under the editorial supervision of, nor does it bear the endorsement of, any organization or association. The editors do not assume responsibility for the opinions expressed by its contributors.

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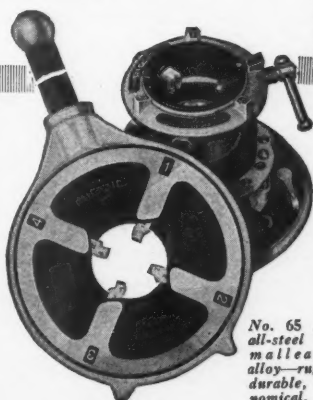
**Faster Working Tools
Reduce the Strain
on your men**



**These work-saver *RIGID* pipe threaders
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**Speedy Self-contained No. 65Rs Thread
4 Sizes of Pipe with 1 set of chasers . . .**

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durable, eco-
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WORK-SAVING PIPE TOOLS

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Pages with the Editors

ANOTHER fourth of July rolls around to witness an outburst of patriotism in present-day America, unequaled since World War I. Manufacturers of flags and other patriotic bunting and insignia report land-office business.

AGREEMENT or disagreement with the administration's foreign policy apparently makes no difference in this revival of demonstrative loyalty for "the flag and the Republic for which it stands." Interventionists, isolationists, liberals, conservatives, laborites, and virtually every group, sect, and organization, with the possible exception of Jehovah's Witnesses, are opening and closing their meetings with pledges of allegiance, mass display of colors, singing of the national anthem, and so forth.

THIS is all to the good. Only we wish it were a little more lasting and consistent. Time was, not so long ago, when some of the more sophisticated and liberal publications and organizations, which are now jumping up and down most belligerently in their devotion to the grand old flag, felt quite differently. They used to sneer at "flag waving." They consistently opposed appropriations for national defense. Any war was simply a capitalistic swindle brought on by "merchants of death." American youth was encouraged to evade such mild military training as ROTC service in colleges. Old-fashioned appeals to national pride were dubbed "chauvinism." It was the smart and witty thing to suppress strong national feeling and flirt with such international movements as Communism.

THEREFORE, we venture the hope, on this forthcoming one hundred and sixty-fifth anniversary of our national independence, that all the voices which will be singing the "Star Spangled Banner" on this fourth of July will be giving us an encore of the same July 4, 1942, and thereafter. One of the lessons in the fall of France and other national tragedies of recent years and months is that patriotism is not something that can be wrapped up in moth balls and put away in the attic along with the flag after the national feast days are over.

INTERNATIONAL movements, whether political, economic, or otherwise, may be the epitome of idealistic unselfishness. But unless they are subordinated to our national loyalty, they lead us into dangerous paths. Much safer is the sentiment expressed in those lines from Macaulay describing the death of the ancient hero, Horatius:

JULY 3, 1941



HERBERT COREY

Public utility companies are keeping the home fires burning.

(SEE PAGE 3)

"And how can man die better
Than facing fearful odds,
For the ashes of his fathers
And the temples of his gods?"

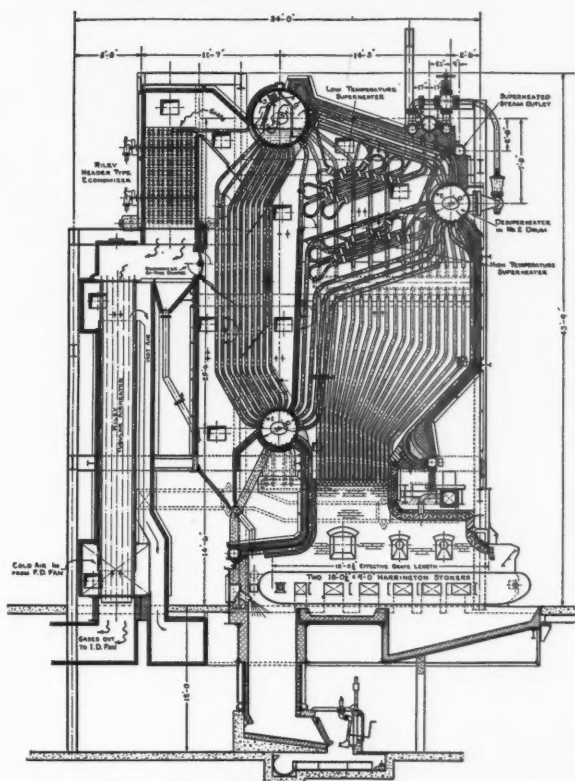
PATRIOTISM during a national emergency requires something different from all of us according to our station, resources, and capabilities. To the young man it may mean active service. To his father it may mean investment in government bonds and savings stamps. To mothers, wives, and sisters, it may mean sacrifices for the maintenance of civilian morale. What does it require of corporations, specifically public service corporations?

THE impact of the present emergency on utility companies has already demanded patriotic sacrifices of time, talent, and money from management, employees, investors, and even consumers. In the last-named connection, we recently witnessed a spectacle of Alabama electric consumers voluntarily curtailing their usage of electricity to help in tiding over the utility service during a period of low water storage for hydro generation.

In this issue we have two articles which

RILEY STEAM GENERATING UNIT

Outstanding American Lignite Burning Installation



OTTER TAIL POWER COMPANY, Wahpeton, N. D.

130,000 lbs. steam/hour, 650 lbs. design pressure, 825° F steam temp.
Unit burns North Dakota Lignite at 82% Efficiency.

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BOSTON NEW YORK PHILADELPHIA PITTSBURGH BUFFALO CLEVELAND DETROIT SEATTLE
ST. LOUIS CINCINNATI HOUSTON CHICAGO ST. PAUL KANSAS CITY LOS ANGELES ATLANTA

COMPLETE STEAM GENERATING UNITS

BOILERS - SUPERHEATERS - AIR HEATERS - ECONOMIZERS - WATER-COOLED FURNACES
PULVERIZERS - BURNERS - MECHANICAL STOKERS - STEEL-CLAD INSULATED SETTINGS

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show what utilities are doing along other lines in the direction of making America invincible. In the opening article HERBERT COREY, Washington newspaper correspondent and author, discusses the policy of utility management towards employees who are called to the service.

IN another article (beginning page 11), JAMES H. COLLINS tells us what utilities are doing in the way of formulating plans for protecting cities from disaster. MR. COLLINS is a well-known magazine writer and editor, now living in Hollywood, California.

ANOTHER article dealing with the relationship between the utility industries and the national defense is that beginning page 23, by ANDREW BARNES, a Washington correspondent for a national press association.

WELL, the national emergency has finally come home to PUBLIC UTILITIES FORTNIGHTLY. The other day the postman brought a letter for our assistant general manager, James M. Robertson. The letter was from the Navy Department and the gist of it was that Uncle Sam's naval forces now have a new Ensign, while Public Utilities Reports, Inc., is minus one assistant general manager—probably “for the duration.”

Mr. Robertson had not been with us very long. Friends in the utility industry may best recall him as the advertising manager of the Florida Power Corporation of St. Petersburg, Florida, and Georgia Power & Light Company of Valdosta, Georgia—a post he held for more than twelve years.

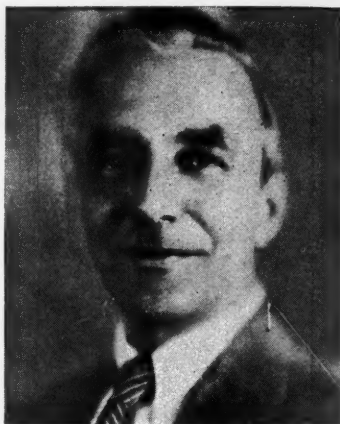
He had also been a Naval Reserve Officer



JAMES M. ROBERTSON

Our seagoing staff member!

JULY 3, 1941



JAMES H. COLLINS

The home guard begins with the utility plant.

(SEE PAGE 11)

for more than four years when called to active duty. He will attend the Reserve Officers Instruction School at Washington for the next few months. Good luck, Jim! We'll try to keep things shipshape on the decks of the FORTNIGHTLY, while you crease the waves for democracy and Secretary Frank Knox.

AMONG the important decisions preprinted in the back of this number may be found the following:

THE Maryland commission refused an order, on application by an electric cooperative corporation, restraining an electric utility company from extending lines into the cooperative's project area on the ground that they were spite lines interfering with the cooperative project. (See page 193.)

THE validity of a commission order refusing to require a telephone company to furnish contract service to a corporation operating a newspaper containing horse-racing news used for gambling purposes was upheld by the Maryland Court of Appeals. (See page 197.)

THE New Jersey commission conducted an investigation into the reasonableness of proposed rates for sewerage service and ruled upon questions of reproduction cost, original cost, and going value. (See page 235.)

THE next number of this magazine will be out July 17th.

The Editors

Efficient jobs! Records governing sabotage delve into Kardex tradition.

Among large and have achieved Air

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WHO IS THE *Right* MAN?

● Efficiency demands placing the *right* men in the *right* jobs! Prudence demands accurate, complete personnel records to avoid possible costly conflicts with Federal governing bodies. Protection against espionage and sabotage requires personnel records that thoroughly delve into employees' backgrounds. These requisites call for Kardex Visible Systems for sound Personnel Administration.

SUCH USERS AS THESE

Among the many government agencies, utilities, and large and small defense and non-defense companies which have adopted Kardex for Personnel Control are: Lockheed Aircraft Corp., Anchor Hocking Glass Co., Sterling

National Bank, Civil Aeronautics Authority, State of California, Civil Service Commission, Lit Brothers, Mutual Benefit, Health & Accident Assoc., American Water Works, and Washington Gas Light Co.

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You must *know* your personnel to benefit fully from their capabilities . . . to promote, demote and shift. You must have at your fingertips, in quickly accessible form, *all* the facts. Only in Kardex will you find the speed and surety of reference and analysis. Only in Kardex will you find all the control and profitable personnel administration aids.

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Please send me your new presentation — "Personnel Administration with Record Control." There is no cost or obligation.

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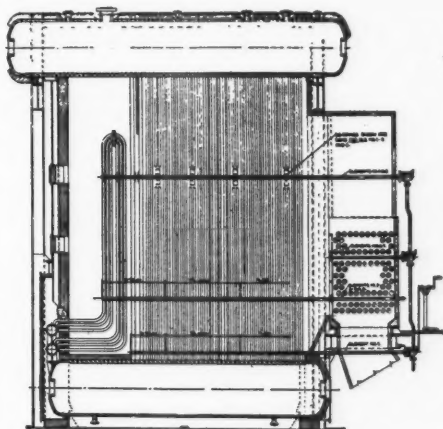
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PREPRINTS FROM PUBLIC UTILITIES REPORTS

Various regulatory rulings by courts and commissions reported in full text, pages 193-256, from 38 PUR(NS)

Another Example of VULCAN VERSATILITY in Soot Blower Design

**Vulcan unit makes notable
4 year record in latest design,
twin furnace Foster Wheeler
steam generator installation
at Oil City, Pa., station of the
Keystone Public Service Company,
operating on fuel relatively high
in ash having a low fusion point.**



Vulcan unit in twin-furnace Foster Wheeler steam generator completes 4 years' service with NO TROUBLE AND NO MAINTENANCE.

... This despite unusual problems presented by novel boiler and furnace design.

... As the drawing shows it was impracticable to install soot blowers from the front of the boiler as the furnace construction precluded installation of conventional type of elements and bearings to provide necessary protection and support.

... Hence, entry was made at the back necessitating carrying the elements a distance of about 26 ft., through the economizer and boiler tube banks to the superheater.

... Passage through high temperature, intermediate temperature and relatively low temperature zones, plus the factor of exceptional length, greatly complicated the problems of securing adequate thermal protection, dependable support, and at the same time provide for expansion and contraction without danger of cutting tubes.

Solution was found by using HyVULoy element

section for the high temperature area, VULcrom element for the intermediate, with the balance steel; and providing specially designed bearings to hold the members in such a way as to eliminate hazard of tube-cutting and directed expansion toward the back of the boiler, where it could be taken up by a suitable expansion joint.

... Because of the advanced design of this boiler involving new features in soot-blower design and construction, Vulcan engineers inspected the installation monthly for many months, but the engineering was so sound that no trouble of any kind developed—Results—Perfect Operation—Perfect Cleaning—Reasonable Cost—And—VULCAN SOOT BLOWERS WERE SPECIFIED when a duplicate Foster Wheeler twin furnace steam generator was recently ordered by Keystone Public Service Company.

... Whatever the characteristics of your boiler and setting, fuel, or load, Vulcan engineers can successfully solve any soot blower installation and operating problem involved. We invite your consideration of Vulcan service with respect to any soot blower need.

VULCAN SOOT BLOWER CORPORATION

DU BOIS, PENNSYLVANIA

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Remarkable Remarks

"There never was in the world two opinions alike."

—MONTAIGNE



E. E. COX
U. S. Representative from Georgia.

EDITORIAL STATEMENT
Broadcasting.

EDWARD L. SHEA
*President, The North American
Company.*

HERBERT R. ANDERSON
*Retiring president, Highway Con-
tractors' Division, American Road
Builders' Association.*

RALPH BUDD
*Transportation commissioner, Ad-
visory Commission to the Council
of National Defense.*

ADOLF A. BERLE, JR.
Assistant Secretary of State.

HENRY A. WALLACE
Vice President.

JESSE H. JONES
Secretary of Commerce.

DONALD M. NELSON
*Director, Division of Purchases,
Office of Production Management.*

TOM WALLACE
*President, The American Society
of Newspaper Editors.*

"We cannot wage a war on WPA principles."

"In broadcasting, we are accustomed to the 'crisis-a-day' diet."

"To a large extent holding companies are the very sinews of American industry . . ."

"The railroads are on their way to becoming bottle-neck No. 1 of the second World War."

" . . . for some years the transportation plant has been too large for the needs of the country."

"We need the 2,000,000 additional horsepower of St. Lawrence electricity—we are short of power at this minute."

"We can't do all the planning and organizing in Washington, and we have no desire to centralize all the planning there."

"Freedom of the press is a part of the heritage of every free-born son of this democracy. It is a vital fundamental of our way of life."

" . . . we dare not let ourselves use our defense program to complete the process of making big business bigger and little business littler."

"We have indulged, maladroitly and mistakenly, a superiority complex with regard to Lat'n Americans who, as a result, have shrugged their shoulders. They have known us too largely through hard-boiled concessionaires whose government, too often, has the concessionaire viewpoint."



TYPICAL of many Burroughs developments is this statistical-accounting machine that saves hours in getting vital figures.

TODAY'S BURROUGHS MACHINES provide control figures faster

New Burroughs machines and features provide every type of record and figure control in less time, with less effort, at less cost.

Burroughs representatives will gladly demonstrate these new developments and show you how they specifically meet today's problems. Telephone your local Burroughs office. There is no obligation on your part.

BURROUGHS ADDING MACHINE COMPANY, DETROIT, MICHIGAN

Today's
Burroughs

DOES THE WORK IN LESS TIME • WITH LESS EFFORT • AT LESS COST

Control Figures that are vital to Production

MANAGEMENT FIGURES—

Vital figure-facts, statistics and reports that permit quick decisions, quick action.

MATERIAL CONTROL—

Records that control the flow of materials to scheduled rate of output—furnish up-to-the-minute statistics and reports.

LABOR ACCOUNTING—

Earnings calculations, wage accruals and payroll records that insure proper payment of personnel—provide adequate statistics and reports.

COST RECORDS—

Cost-to-date figures—available every day—that provide expense and production controls and statistics for review.

REMARKABLE REMARKS—(Continued)

JAMES H. POLHEMUS
President, Portland General Electric Company.

"I think it is high time that the electric utility industry of the Pacific Northwest let it be known far and wide that it is not going to be kicked around."

SUMNER T. PIKE
Member, Securities and Exchange Commission.

"Integration and simplification will increase utility managerial and operating efficiencies which are essential to the effective mobilization of industry for defense purposes."

HERMAN RUSSELL
President, Rochester Gas & Electric Corporation.

"The power shortage bugaboo has for its purpose discrediting of private utilities to justify in the public mind vast governmental undertakings, such as TVA, Grand Coulee dam, and the St. Lawrence seaway."

NILES TRAMMELL
President, National Broadcasting Company.

"I do not purport to know why such a bombshell [FCC monopoly report] should be exploded at this critical time in the life of our country, when the fullest use of the nation's radio facilities is demanded."

DAVID E. LILIENTHAL
Director, Tennessee Valley Authority.

"The TVA is a new and different instrument of democracy—something new under the sun. It shows democracy can adapt itself. TVA is building a bridge of understanding between government and farmers, labor, and businessmen."

WILLIAM R. WHITE
New York State Superintendent of Banks.

"One of the things we must guard against in this critical era is wasted effort. Materials, man power, and tools should be utilized to the utmost in the prosecution of our defense effort. This is not the time to manufacture nonessentials."

FRANKLIN DELANO ROOSEVELT

"We must have more ships, more guns, more planes—more of everything. This can only be accomplished if we discard the notion of 'business as usual.' This job cannot be done merely by superimposing on the existing productive facilities the added requirements for defense."

ARTHUR H. VANDENBERG
U. S. Senator from Michigan.

"... I am very happy, indeed, that the able senior Senator from Maine [White] has clothed the 'Quoddy' debate with a pleasant and kindly word about this project. I merely observe that the Senator practices the human habit of speaking only good of the deceased at a funeral."

FRANKLIN J. GRIFFIN
Boston investment banker.

"The predicament of the utility industry, as relates to increasing gross revenue and stationary net income, is not unlike that of Alice in Wonderland. 'It's a slow sort of country,' said the Queen to Alice, 'here, you see, it takes all the running you can do to keep in the same place.'"

JULY 3, 1941

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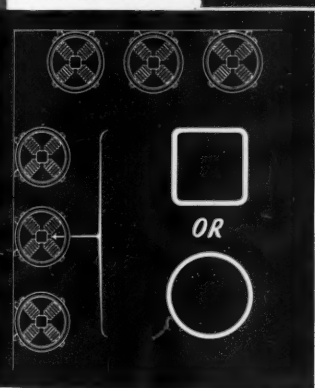
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*neat, streamline
appearance—easily ac-
cessible to inspection and
adjustment.*

*superstructure nec-
essary—easily mounted
on wall or ceiling. Note
the gap between phases.
Buses can be round or
square as shown below.*



All stresses taken by mounting
frame with insulators in compres-
sion loading under all conditions.

Gasketed covers are housings only,
—take none of the stress.

Installation and adjustment made
before covers are put on.

Housing covers can be removed
easily for inspection.



R&IE METAL ENCLOSED BUS—Eliminates Interphase Shorts.

Expensive equipment investments may now be safe-guarded
from interphase shorts often due to dust pocket flashovers
in congested areas where buses are exposed, or due to
support structure failure. Here is a new outstanding design
consistent in cost with any type of bus structure.

RAILWAY AND INDUSTRIAL ENGINEERING CO.
GREENSBURG, PA. In Canada, **EASTERN POWER DEVICES, Ltd., TORONTO**

FOR THIS RANGE and many intermediate CAPACITIES

60,000 lb*
capacity

60,000 lb VU Unit for a mid-western public utility. Design pressure 500 lb. Total steam temperature 735 F. Fired with pulverized coal.

UTILITIES ARE SELECTING C-E'S

THESE three units selected from the numerous purchases of this type by public utilities during 1940, emphasize the range of capacity requirements which are admirably served by the VU Steam Generator. There are no essential differences of design among the three units. Drum sizes, amount of heating surface and general dimensions of the VU Unit are varied in standard increments to suit the requirements of the individual job.

Such standardization offers two important benefits to those public utilities which will purchase additional steam generating equipment during 1941. First, is the result of painstaking refinement of design and excellent quality of construction which qualify the VU Unit to meet the stringent requirements of public utility service with their need for the high thermal efficiency and low maintenance which provide economical steam generation. Yet no premium is added to the first cost for the extensive research and development which preceded the

*Also available for capacities as low as 30,000 lb per hr.

introduction of the VU Steam Generator.

The second benefit may be even more important under present circumstances. With the preliminary engineering work of this standardized design already completed, the public utility needing additional facilities can avoid some of the delay which might be occasioned by the heavy production schedules prevailing today.

VU Units are virtually universal in application. Besides providing capacities from 30,000 to 300,000 lb of steam per hr, they are in service in plants located in all sections of the country. They are burning all kinds and grades of fuel and are meeting a wide range of service conditions. That they are turning in impressive records of performance is proved by the numerous repeat orders which are regularly received from highly satisfied customers.

Examine a few of the outstanding features of the VU Steam Generator which are described on the right hand page. Additional information will gladly be forwarded on request.

A-570

C-E Products include all types of boilers, furnaces, pulverized fuel systems and stokers; also Superheaters, Economizers and Air Heaters.

COMBUSTION

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150,000 lb capacity

150,000 lb VU Unit for a mid-western public utility. Design pressure 725 lb. Total steam temperature 835 F. Burns pulverized coal or oil.

300,000 lb capacity

300,000 lb VU Unit for a southern public utility. Design pressure 1,000 lb. Total steam temperature at the superheater outlet 910 F.

STANDARDIZED VU STEAM GENERATOR

Advantages of the VU STEAM GENERATOR

SYMMETRY

Each elemental section includes the same amount of furnace volume, of boiler heating surface and of superheater surface as any other. Gas volume, velocity and temperature, at any point from front to rear, are practically constant across the width of the unit.

SUSPENSION

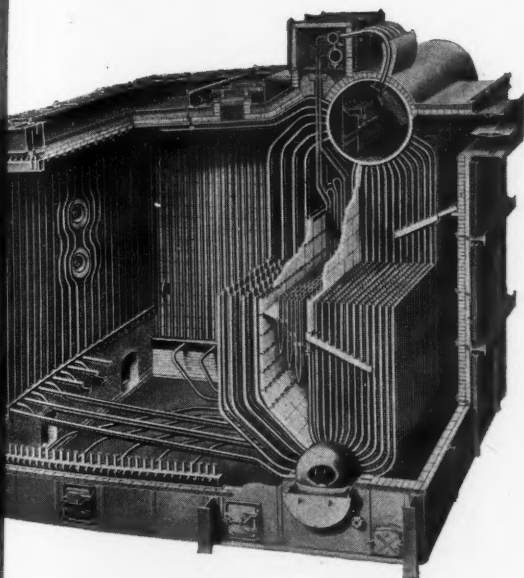
Overhead suspension of all pressure parts of the unit provides complete freedom of expansion in all directions to compensate for the effects of temperature changes. Abnormal mechanical stresses in pressure parts are thereby eliminated and freedom from leaky joints is assured.

QUALITY STEAM

The most active of the steam producing tubes enter the drum above the normal water line and discharge uniformly across the full drum length thereby reducing turbulence and assuring a stable water level and dry steam even under adverse conditions.

STEEL ENCASED

Within a permanent outer steel casing, the combination of shaped tile, refractory and 100% insulation reduce to a minimum the heat losses caused by radiation and air infiltration. A uniformly low surface temperature minus hot spots is maintained and upkeep is negligible.



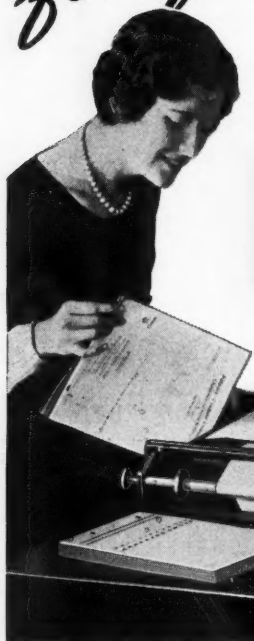
COMBUSTION ENGINEERING COMPANY, INC.

200 Madison Avenue, New York, N. Y.

ENGINEERING

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Modern Performance for your Elliott Fisher with **EGRY** **CONTROLLER**



An automatic, electrically driven attachment that feeds EgrY multiple copy continuous forms in perfect alignment in pre-determined length on to the platen of your Elliott Fisher. The new, speed way to write all business records, to accomplish more per day by doubling the output per operator; to wipe out delays, lost motion and waste.

DEMONSTRATIONS

Without cost or obligation the EgrY Controller will be demonstrated in your own office on request. Phone, wire or write. Get the most out of your Elliott Fisher by vastly increasing its usefulness with the EgrY Controller. Address Dept. F-73.

The EGRY REGISTER Company
Dayton, Ohio

SALES AGENCIES IN ALL PRINCIPAL CITIES

The EgrY Register Co., (Canada) Ltd. King & Dufferin Sts., Toronto, Ontario, Canada

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Half a Job is Worse than None

SURE, we sell store fronts—one every few minutes of every working day, to be exact. But we would rather not sell a front than to install one that does only half a job. If a front won't increase that customer's business, we don't want him to buy it. That's just plain common sense. Don't you feel the same way about your sale of increased illumination?

Our fronts are much more effective when illumination becomes an integral part of their styling—and when the interior of the store and display windows are highly illumi-

nated. For this reason it is logical for our salesman to suggest increased lighting to his store front prospects.

But, by the same token, it is equally sound reasoning for commercial lighting salesmen to suggest new fronts to their prospects. Only by such cooperation will we both avoid doing "half a job." We'll do our share. How about you?

When you think of store fronts, think of "Pittsburgh" Pittco Store Fronts . . . the leader in the field.

PITTCO STORE FRONTS

PITTSBURGH PLATE GLASS COMPANY

"PITTSBURGH" stands for Quality Glass and Paint

TRIDENT



The Story of a Sound Investment

TWO essential facts set the Trident Water Meter apart from all others, as a profitable investment, and as a dependable source of Water Works revenue.

First — this water meter was first produced in a form so basically correct, so fundamentally right for its purpose, that its basic design has never been essentially changed. That is to say, later improvements have not made older Trident Meters obsolete.

Second — every essential improvement in Disc Water Meters made in the last 40 years is found in the modern Trident Meter today . . .

— and can be incorporated in Tridents made as long as 40 years ago, by means of modern Trident interchangeable parts.

Think! Even in 1899, there were such "modern" Trident pioneering features as the Breakable Bottom, the Thrust Roller and the Snap-Joint Disc Chamber, which protect accuracy and reduce maintenance cost in Trident Water Meters today.

At first, as the initial million Tridents were produced, improvements (such as heat proof renewable bushings) were minor . . . but the basic design of the Trident Meter remained unchanged. New models

did not supplant older ones.

Then, as the Trident millions swiftly mounted, Neptune pioneered in new ways to improve and protect meter accuracy and prolong life—still without the necessity of changing the basically correct design of the meter, without making old models obsolete.

The year 1919 saw the introduction of such further technical developments as the Trident Oil-Enclosed Gear Train. Screwless Registers were perfected in 1921-24; the 3-part Disc in the latter year; the Protective Sand Ring two years later; then in 1939 came the Thrust Roller Bearing Plate . . . all readily inserted into old Trident Meters.

Remember one thing — all this time the basic Trident Meter design has remained unchanged. In other words, Trident Meters of yesterday can logically be made "better than new", by the insertion of the interchangeable parts of TODAY. Interchangeability was, and is, the basic principle and policy of Trident Meter design.

Today the Trident Meter remains, as it always has been, the best water meter on the market, if the testimony of more than 6 million made and sold (the great majority still in service) is a true criterion of value.

NEPTUNE METER COMPANY • 50 West 50th Street • NEW YORK CITY

Branch Offices in CHICAGO, SAN FRANCISCO, LOS ANGELES, PORTLAND, ORE., DENVER, DALLAS, KANSAS CITY, LOUISVILLE, ATLANTA, BOSTON.

Neptune Meters, Ltd., 345 Spadina Avenue, Toronto, Canada.

**OWNER OF LOW
PRICED TRUCK 'A',**

"I checked up on Dodge.
It's Dodge for me
this time!"

**OWNER OF LOW
PRICED TRUCK 'B',**

"I compared costs ... It's
a Job-Rated Dodge
for me!"

**OWNER OF
DODGE ~~Job-Rated~~ TRUCK,**

"My bank account
proves that a
Job-Rated Truck
saves money!
I'm going to get
another Dodge!"

3 TRUCK BUYERS GO TO MARKET

...and "Job-Rated" wins again!

... sure the swing's to Dodge *Job-Rated* Trucks!
Here's why: A truck that fits the job is a
better truck -- gives better performance -- costs
less to operate -- lasts longer -- saves time --
saves money! And new Dodge *Job-Rated* Trucks
are the best trucks ever built -- best Quality --
best Value. Compare them with any truck at any
price! Be sure you get the most for your money!



LOOK AT

Priced Truck 'A'

LOOK AT

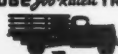
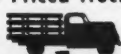
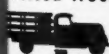
Low Priced Truck 'B'

LOOK AT

LOW PRICED
DODGE *Job-Rated* TRUCKS

AND LOOK AT

THESE DODGE
LOW PRICES



Chassis .. \$500⁰⁰
(WITH COWL)

Chassis .. \$595⁰⁰
(WITH CAB)

Pick-Ups \$630⁰⁰

Panels .. \$730⁰⁰

Stakes .. \$740⁰⁰

Above prices are delivered at Detroit, Federal taxes included.
Transportation, state and local taxes (if any) extra. All
prices shown are for 1/2-ton except stake model which is for
3/4-ton. 112 standard chassis and body models available.

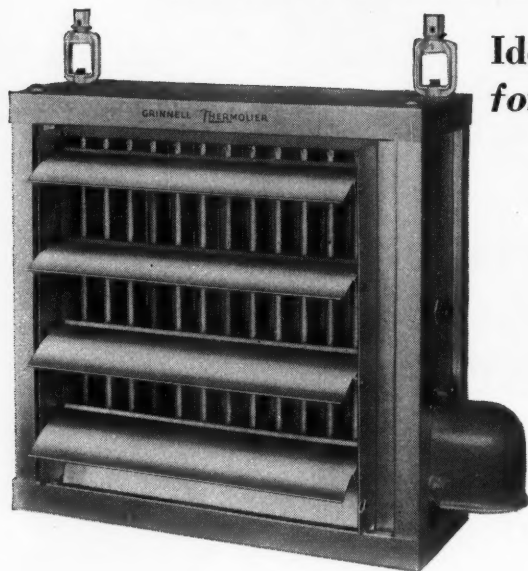
PRICES AND SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE

DEPEND ON DODGE
Job-Rated **TRUCKS**

Job-Rated MEANS "A TRUCK THAT FITS YOUR JOB"

SELL COMFORT for isolated spots

**GRINNELL ELECTRIC TYPE THERMOLIER OFFERS
UNUSUAL OPPORTUNITIES AS A LOAD BUILDER**

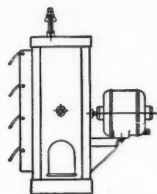


Grinnell Thermolier, Electric Type, opens new markets for efficient heating in isolated spots.

It provides simple, easy installation. Consider it either for your own plants or as a top-notch specialty for your Sales Department. The specially built electric fan combined with a protected heating element assures a full measure of even heat. Six sizes and capacities. Write for full details. Grinnell Company, Inc., Executive Offices, Providence, R. I. Branch offices in principal cities of the United States and Canada.

Ideal Heating Equipment for: TEMPORARY CONSTRUCTION

**BRIDGE CONTROL HOUSES
VALVE HOUSES
GATE KEEPERS' HOUSES
FILLING STATIONS
PARKING LOTS
GARAGES
DRYING PROCESSES
WAITING ROOMS
CRANE CABS**

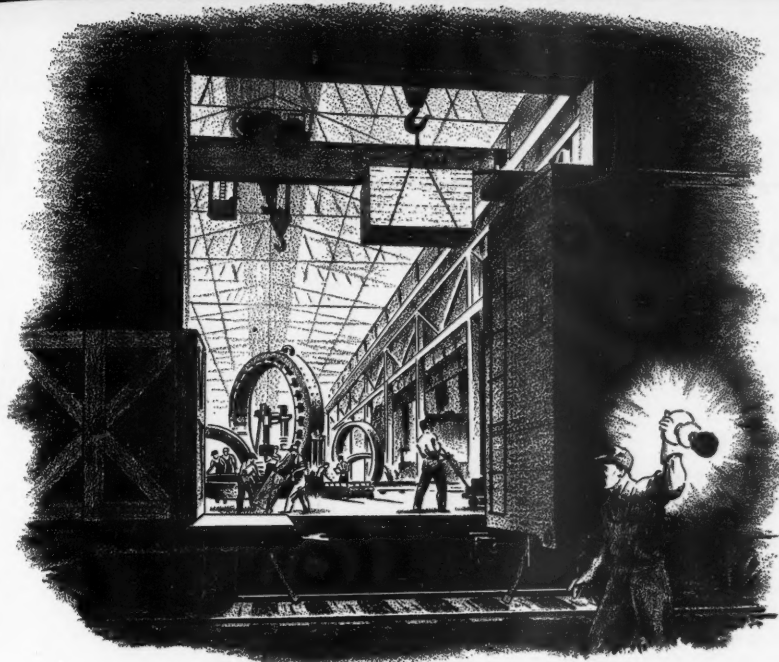


THE HEATING ELEMENTS

G-E Strip Heaters, specially built, with protective coating good for 1000° F., mounted to allow for expansion, protected against over-heating by thermal over-load cut-off which disconnects heating element if fan stops. Cut-off easily reset by a button control.

GRINNELL THERMOLIER
THE UNIT HEATER WITH 14 POINTS OF SUPERIORITY

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Out of the Night

LOS ANGELES it is ten o'clock; in Detroit, one; in Schenectady, it is two o'clock in the morning.

Los Angeles a young riveter moves a little down the row of rivets that stitches a wing airfoil. In Detroit a helmeted welder concentrates on the harsh arc that knits two pieces of one-inch steel plate. In Schenectady a machinist watches a little more intently the tool that pares a precise 1/1000 of an inch from a 20-inch steel shaft.

Listen! You will hear them: staccato beat of guns . . . crackle of welding torches . . . whisper of turning lathes. The sounds of America working!

Look! You will see them: factory windows aglow at night . . . long freights rolling by in twilight . . . somewhere in Newfoundland six bombers, motors idling, poised east-

ward on a runway in the gray dawn. The signs of America producing!

Many men, many places, three shifts. But *one* job—to make America secure.

Different machines, making different things—bombers in Los Angeles, tanks in Detroit, generators in Schenectady. But behind them all *one* universal force: electric power—turning lathes, joining metals, providing a changeless, universal light.

For more than 60 years electricity has been the power that makes all work kin. In itself one of the major industries that have contributed so much to American life—contributing now in its own right to national defense—electricity is today vital to all the others as they labor "all-out" in America's defense. General Electric Co., Schenectady, N. Y.

GENERAL  **ELECTRIC**

962-21116-211

Just Published!

How to wire

residential, farm
and industrial
buildings

for light and power

Step-by-step methods fully and simply explained in this new single, sensible book—showing you:

- the ABC of electrical science
- the basic materials and jobs of wiring
- how to plan installations
- how to wire old and new buildings

NEW SECOND EDITION

PRACTICAL ELECTRICAL WIRING

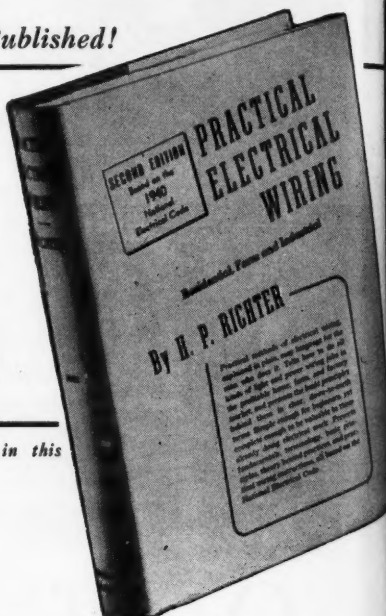
By H. P. Richter

Member, International Association of Electrical Inspectors

521 pages, 5 1/2 x 8, 457 illustrations, \$3.00

HERE is a complete course of instruction for those who want to learn how to do electrical wiring. Begins with very first elements and takes the reader by easy steps, plain instructions and methods, to the completion of typical wiring jobs in accordance with official requirements of the 1940 National Electrical Code. Employs simple language; confines mathematics and theory to the minimum necessary for understanding of the work; covers medium voltage jobs of the types that are most in demand.

**REVISED THROUGHOUT
in accordance with the
1940 NATIONAL
ELECTRICAL CODE**



33 understandable

chapters cover:

1. Underwriters and codes; electrical principles and measurements; basic devices and circuit wire, sizes and selection; connections and joints; residential and farm motors; etc.
2. Planning an installation; special outlets; switches and other devices; old work; farm wiring; isolated lighting plants; wiring apartment houses; etc.
3. Planning non-residential installations; non-residential lighting; miscellaneous problems; wiring for motors; wiring school offices, stores, churches; etc.

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Munsey Building, Washington, D. C.

Please send me a copy of Richter's Practical Electrical Wiring postpaid. I enclose \$5.00 in

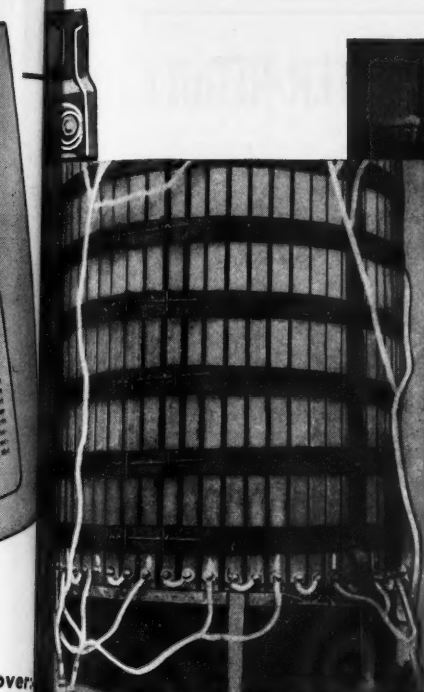
☐ check ☐ money order ☐ cash

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ADDRESS

CITY AND STATE

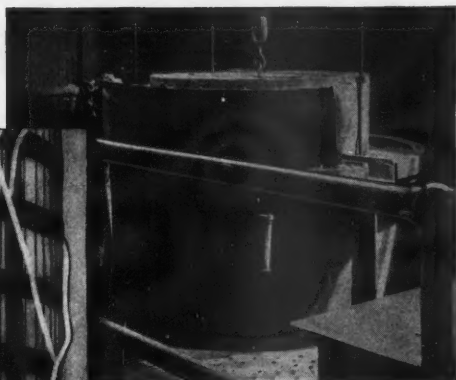
Industry needs **MORE ELECTRIC HEAT**
 speed up the Defense Program



63 CHROMALOX STRIP HEATERS

mounted vertically around this tank, provide an operating temperature of 960 deg. F. Power supply 230-V, 3-phase. Uniform heat is assured by a pyrometer controller with suitable contactor.

Chromalox strip heaters can be supplied flat (as illustrated at the left), curved in cross-section to fit snugly against pipes, or curved in length to encircle round tanks. They are one of many available forms and types of Chromalox units.



The completely insulated salt bath in operation. Two-thirds of this furnace is below floor level.

THIS 35 KW. CHROMALOX ELECTRIC HEATER

*... has been building load
 24 hours per day for 6 years*

An aircraft plant now humming with defense production, operates the electrically heated salt bath pictured, heat treating aluminum 24 hours per day.

Like many other Chromalox heated industrial applications, this furnace produces increased revenue for the utility because much of this load is off-peak.

Defense industries everywhere want faster and better means of heating their productive processes, machines, tanks, etc. Wiegand electric heating experts will work with your engineers in meeting this need.

Let us discuss your specific problems.

EDWIN L. WIEGAND COMPANY

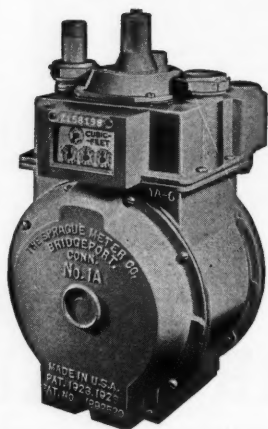
7500 Thomas Blvd.

Pittsburgh, Penn.

CHROMALOX

The load builder

SPRAGUE COMBINATION METER-REGULATOR



LATEST ACHIEVEMENT
IN
GAS MEASUREMENT AND
CONTROL.

*For Manufactured,
Natural and Butane Service*

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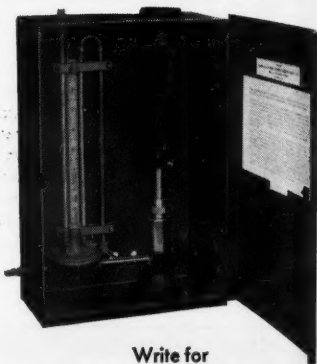
THE SPRAGUE METER CO.
Bridgeport, Conn.

Visual Check OF BTU CONTENT AT ANY POINT ALONG THE LINE WITH **CONNELLY CALOROPTIC**

Under the peak loads imposed by present day production schedules, close control of BTU content is essential.

The Connelly Caloroptic provides constant visual reading in BTU without any log, corrections or calculation. It can be installed in a permanent position or used portably, making it a simple matter to make spot checks of BTU value at any point in the manufacturing and distributing system.

This constant visual indication of BTU content results in increased production, protecting against excessive variations in gas quality. In actual use in leading gas plants of the country, the Connelly Caloroptic has proved conclusively that direct savings effected by its use will pay its initial cost many times during the first year.



Write for
illustrated bulletin

CONNELLY IRON SPONGE & GOVERNOR CO.
CHICAGO, ILL. ELIZABETH, N. J.

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You'll find it in a FORD TRUCK and nowhere else!



TO FORD TRUCK engineers, the word "exclusive" means "better" as well as "different." The lowest-priced Ford Truck has a number of *exclusive* quality features that help you haul better—faster—cheaper!

See the Ford Dealer about the *exclusive* and *time-tested* features which are available in Ford Trucks, but found in no others! Ask him to arrange an "on-your-job" test. With choice of 42 body and chassis types, 6 wheelbases and 3 engine sizes, there's a Ford combination for your loads!



Only the Ford has **V-8 POWER**, for smooth, economical and dependable operation. Users have a choice of two sizes of V-8 engines.



Only the Ford has **DIRECT DRIVEN DISTRIBUTOR** for super-accurate timing.



Only the Ford has **CAST STEEL CRANKSHAFT AND CAM-SHAFT** for exceptional resistance to wear. 300% longer wearing.



Only the Ford has **PRECISION-SET VALVES**—with intake and exhaust valve seat inserts—for longer life efficiency. No lifters to adjust.



Only the Ford has **STARTER BUTTON ON INSTRUMENT PANEL**—leaving both feet free to operate pedals when starting on hills.

FORD TRUCKS

AND COMMERCIAL CARS



**YOU'LL LIKE THIS
SECTIONAL
UPWARD-ACTING
Galvanized
Steel
Door**

BECAUSE IT OFFERS MORE



KINNEAR'S ALL-STEEL RoL-TOP

**SETS A NEW PACE IN ECONOMY,
DURABILITY AND EFFICIENCY**

The Kinnear Steel RoL-TOP gives you all the advantages of a modern, upward-acting, sectional door plus durable, all-steel construction—extra value in longer wear under hard, daily service. Its rugged, galvanized steel sections provide lasting resistance to rust and the elements. They offer extra protection against fire, intrusion, weather, wear and accidental damage. And because this is a KINNEAR Door, you can be sure that maximum durability has been built into every detail of its space saving upward-acting design!

The Kinnear Steel RoL-TOP is built in any size, with either motor or manual operation, and with any desired number of light sections. They are easy to install, in old or new buildings. Write today for complete information. The Kinnear Mfg. Company, 2060-80 Fields Ave., Columbus, Ohio.

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KINNEAR
ROLLING DOORS

SEND FOR THIS NEW KINNEAR CATALOG

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This



DEPENDABILITY . . . IN EMERGENCY OR IN ROUTINE SERVICE

THE dependability of the telephone employee has become one of America's traditions. Over and over again, in the face of danger from fire, flood or other destructive force, these courageous workers have displayed a loyalty far beyond the actual call of duty.

Dependability is a part of the fabric of the daily lives of every man and woman engaged in telephone work. And dependability is equally an essential basic part of the equipment on which telephone companies rely.

That is why Exide Batteries are found in so many small and large telephone exchanges or, in fact, throughout all the utilities where truly dependable battery power is required for any purpose.

THE ELECTRIC STORAGE BATTERY CO.

*The World's Largest Manufacturers of Storage Batteries
for Every Purpose*

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DAVEY TREE TRIMMING SERVICE



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JOHN DAVEY
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Always use dependable Davey Service

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DAVEY TREE SERVICE

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PUBLIC UTILITY
REGULATION

571 pages, \$4.00

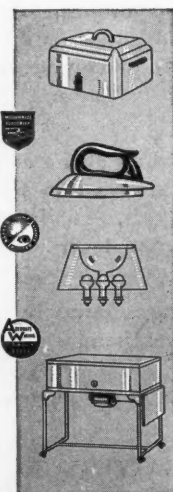
AN analysis of the nature, extent, and problems of public utility regulation in the United States with emphasis upon the expanding role of the Federal Government in the regulation of public utility activities in undertaking power projects and promoting rural electrification, and the issues involved in governmental ownerships. The well-rounded treatment and critical viewpoint will be of aid to all who are interested in evaluating the present status of public utility regulation, its strengths, weaknesses, and significance for privately-owned industry.

Order from

Public Utilities Reports, Inc.

Munsey Bldg.

Washington, D. C.

ONLY WATTHOURS *Metered* ADD REVENUE *Gains*

12,000,000 meters

now in service are old and uncompensated. Considerable revenue losses often result from metering modern appliance loads with these uncompensated meters. With modern Sangamo Type J Meters, however, the loads imposed by today's diversified electric appliances are metered accurately—resulting in full revenue for all load gains.



PAYLOADS when metered with *modern meters*

SANGAMO ELECTRIC COMPANY

SPRINGFIELD - ILLINOIS

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Are you KEEPING POSTED on public utility developments?

Do you know how the latest developments and changes affect the public utilities' place in our economic structure? Now you can get a *clear, understandable* picture, for

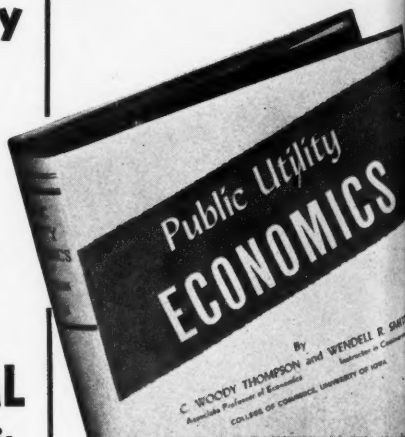
**THIS NEW BOOK ➡
GIVES YOU A FULL
AND FRESH APPRAISAL
of problems confronting public
utilities today—**

This book is designed to show the place which public utilities occupy within our economic structure and the special problems of price control service supervision, security regulation, etc., which the march of events since 1933 has brought about.

Accepting the dominance of private ownership in all fields but water supply, the book is primarily an illustration of institutional economics. The book draws upon the literature of 47 state and four federal commissions, one federal and 48 state judicial system, as well as many trade and semiofficial organizations.

Answers your questions on:—

- Public Utility Organization and Finance
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- Rate Making Theory and Practice
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PUBLIC UTILITY ECONOMICS

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and Wendell R. Smith
*Instructor in Commerce, State
University of Iowa*

726 pages, 6 x 9, illustrated, \$4.50

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Facts You Can Use to Cut Distribution Costs

**TRANSITE DUCTS
RESIST
CORROSION!**

M AINTENANCE costs stay low when Transite Ducts are used. Entirely inorganic and non-metallic, these asbestos-cement ducts are highly resistant to corrosion. They can't rust or rot... won't burn.

Yet low maintenance is only part of the savings made by using Transite Ducts. Supplied in long, light lengths, these durable cableways are installed quickly and easily; thus, installation costs are kept low. For details, write for brochure DS-410. Johns-Manville, 22 E. 40th St., N. Y.



CORROSION-RESISTANT, rustproof, Johns-Manville Transite provide maximum assurance of long life and low maintenance when used on exposed locations. On many installations, such as the one shown Transite Conduit outperforms more expensive materials commonly used for exposure.



UNUSUALLY WEATHER-RESISTANT, these asbestos-cement ducts may be safely stored outdoors. Their sustained strength permits piling to convenient heights without distorting or crushing the duct.



UNIFORMLY STRONG AND DURABLE, J-M Transite Conduit needs no protective casing underground. And its tough asbestos-cement composition offers superior protection against corrosive soils.

**FOR
EFFICIENT,
LOW-COST
SERVICE,
SPECIFY...**



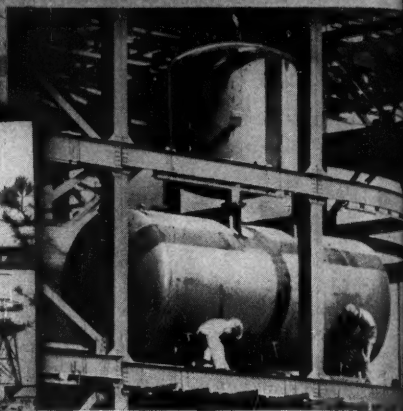
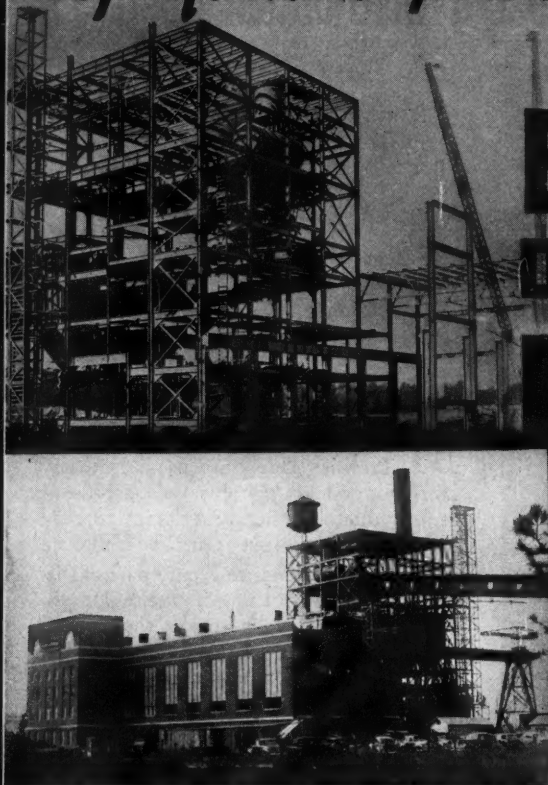
Johns-Manville TRANSITE DUCTS

TRANSITE CONDUIT... For use underground without a concrete envelope and for exposed locations.

TRANSITE KORDUCT... For installation in concrete. Thinner walled, lower priced, but otherwise identical with Transite Conduit.

Up go new power stations
protected by

ELLIOTT DEAERATORS



The photographs show two interesting southern utility plants in construction—the Chickasaw Station of Alabama Power Company near Mobile, and Plant Arkwright of the Georgia Power Company near Macon. These stations are installing three Elliott 400,000-lb.-per-hr. vertical deaerators mounted on storage tanks—one unit at Chickasaw and two at Arkwright. (Plant Arkwright, in addition, is putting in two Elliott 31,300-sq.-ft. condensers.) The deaerators, of Class I welded construction, are designed for an operating pressure of 100 lb. gage. They act as the No. 3 heater in a four-stage extraction heating system. Thus deaeration is obtained along with feed heating at very incidental cost. The storage tank provides for feedwater additions or rejection.

THE steel skeleton of a fine new power plant thrusts upward against the sky. Before it is completed, high up within the framework appears the form of an Elliptical deaerating heater.

The high position of this unit might be considered symbolic of the importance to modern plants of feedwater deaeration. For designers agree that complete removal of oxygen from feedwater is a paramount consideration in high-pressure stations . . . and that the comparatively low cost of a deaerating heater is a bargain in trouble prevention and operating tranquility.

Elliott pioneered deaeration, and the unparalleled experience of our engineers is at your service in the designing and building of deaerating equipment in any required size, fitted in form and in accessories to your space and heat balance requirements. In matters of deaeration, talk it over with the Elliott engineers.

959b



ELLIOTT COMPANY

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JEANNETTE, PA.
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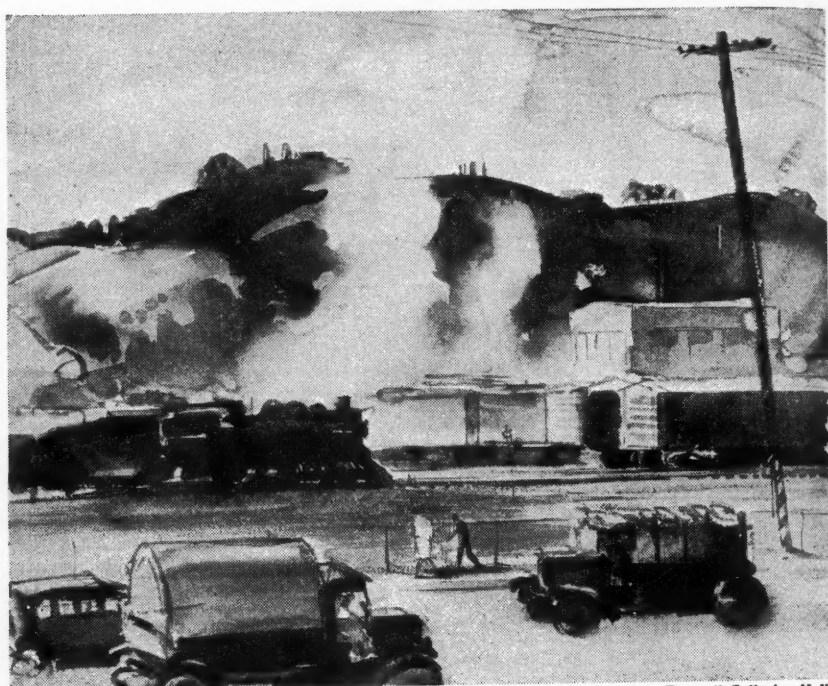
Utilities Almanack

⌘

JULY

⌘

3	T ^a	† Michigan Independent Telephone Association will hold meeting, Lansing, Mich., July 23, 24, 1941.
4	F	† Fourth Annual Appalachian Gas Measurement Short Course will be held, Morgantown, W. V., Aug. 18-20, 1941.
5	S ^a	† National Association of Railroad and Utilities Commissioners will hold convention, St. Paul, Minn., Aug. 26-29, 1941.
6	S	† Municipal Electric Utilities Association of New York State will hold meeting, Jamestown, N. Y., Sept. 3-5, 1941.
7	M	† Mid-West Gas School and Conference will be held, Ames, Iowa, Sept. 8-10, 1941.
8	T ^a	† Pacific Coast Gas Association will hold convention, Del Monte, Cal., Sept. 10-12, 1941. ☺
9	W	† Empire State Gas and Electric Association will hold meeting, Saranac Inn, N. Y., Sept. 11, 12, 1941.
10	T ^a	† American Water Works Association, New York Section, will convene for fall meeting, Glen Falls, N. Y., Sept. 11, 12, 1941.
11	F	† Association of American Railroads, Telephone Section, will hold meeting, Cincinnati, Ohio, Sept. 23-25, 1941.
12	S ^a	† American Transit Association will convene for annual meeting, Atlantic City, N. J., Sept. 27-Oct. 2, 1941.
13	S	† American Bar Association will hold annual convention, Indianapolis, Ind., Sept. 29-Oct. 4, 1941.
14	M	† United States Independent Telephone Association will hold convention, Chicago, Ill., Oct. 14-17, 1941.
15	T ^a	† American Gas Association will convene for annual meeting, Atlantic City, N. J., Oct. 20-24, 1941.
16	W	† American Public Works Association will hold meeting, New Orleans, La., Oct. 26-29, 1941. ☺



Elsie Hafner

Courtesy, Ferargil Galleries, N. Y.

"Highway to Frisco"

From a Painting by Barse Miller

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Public Utilities

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The Utilities and the War

The technician problem, protection of drafted employees, and elaborate precautions against sabotage

By HERBERT COREY

IF the new Army is not to be more than a million men and the war emergency does not run longer than a year or thereabouts, the utilities will not worry about man power. They will not need to.

"We will all worry, of course. The shoe pinches a little on every foot . . ."

But the utilities can get along. They will have a few of their younger men drafted—might as well use the good old word "drafted" for the operation; if you call a conscript a selectee the word may look prettier in print but baloney is still baloney—and a few others have been members of the National Guard and the Naval Reserve

and the ROTC. But the utilities will not be bothered by this. Some of their more blood-pressured officials may stamp around a bit, but this is not likely. So far as I know every utility in the United States is trying to do everything possible to make the defense program run smoothly. Any utility that is being bothered by the pure mechanics of releasing a few young men to go into the Army has a wrong spot somewhere in its management.

But if the Army stretches into 2,000,000 men the utilities will have plenty of trouble. So will every one else, of course, for a 2,000,000-man

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Army would mean that the term of enlistment would be for more years than a 1,000,000-man Army. If the Army expands into 4,000,000 men, and that is what the heads of the Army have been talking ever since the expansion began, following the lead of the heads in the administration, then the utilities will be in a dreadful mess. So will every one else, of course. To take 4,000,000 men out of the paths of peace and make soldiers of them would violently interfere with the lives of every one of us. Perhaps the utilities would not lose more men than any other industry.

"But we would suffer plenty," said the man, grimly.

THE man is a composite figure, made up of men who know what is going on in the utility world. He talked hard sense:

"The utilities need a continuous trickle of young blood," he said. "The industry bears a certain superficial resemblance to a government, for it has its different activities and departments and a kind of a civil service and merit system. It can get along now with the engineers it has in stock. But by and by the engineers would be wearing out or retiring on pension, and if it did not have a new line of engineers coming along it would be back of the eight ball. So we keep feeding engineers into the industry as they come along from the schools. Some of them fail; some become researchers and specialists; some are hired away from us; and some die, but there is a steady line of supply."

That line is slimming down a bit.

It may be restored to what should be its normal later on. The Selective

Service Act seems due for a considerable revision if it appears that the United States will actually get into the war. If that should happen, then war will become the foremost business of the United States. Everything else will be subordinated to it. Up to this moment—this is said with a deprecating smile in practically every direction—the war effort of the United States has suggested the activities of Brown, who used to shave, hot towel, and haircut the learned members of the Cosmos club. Brown explained his late arrival one day by the statement that he had been arrested:

"I was out with my new automobile," he said, "and a cop got me for amateuring in traffic."

BUT if we actually go to war we will all get busy and this is a nation of businessmen who know how to get busy. The Selective Service Act was something of a bungle to begin with and it has been administered in a hit-or-miss fashion. Men were taken within certain age brackets if they had not too many flat feet and if their reflexes were satisfactory and with little regard to their relation to the social and industrial structure. Germany handled the same problem in a more intelligent fashion. Men were not taken out of key positions just because they were born under the sign Sagittarius. An engineer was only clapped into the feld-grau if the army needed him as an engineer, and so industry was not handicapped. It is true that Germany worked for seven years to dovetail her army and her industry and that she had learned something from the first World War. But all those lessons had been spread before us and we did not

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study them. We are just beginning to get them now.

"So," said the man, "we are not getting the trickle of young engineers from the schools that we should get."

"Surely they are not all being tapped for the Army?"

"That isn't it. All industry wants young engineers right now. American industry has done a superb job after starting from scratch. It has built, reconstructed, planned, and manufactured at a speed no other country in the world could match. Germany performed a miracle in seven years under a dictatorship. We will trump that miracle in two years. Of course young engineers are wanted. In the war industries they are protected from the draft. Last month the first 155-millimeter gun ever built in the United States was turned out, and it will be followed by —*quien sabe?*—thousands of other 155's. What do you think would happen if a local board were to snatch some of the young engineers employed by the men who make the 155's?"

"They would go on the deferment list.

"Bill Knudsen would see to that. Of course, Knudsen is technically not associated with the Selective Service machinery. But he is in charge of production and he could and has pulled the wires necessary to see to it that

such young engineers are saved to industry. The young engineers know these things. The utilities lose their engineers for one reason or another and go to the schools to replace them and the young engineers give us the fish eye.

"Can you assure us of deferment?" they ask.

"Sorry. We cannot."

"Elsewhere I can be assured. So I am not interested in your job."

THIS was no complaint of discrimination. Perhaps later the kink will be ironed out of the Selective Service Act. Nor was there even a suggestion that the young engineers were not justified in their insistence on getting into posts in which they would be protected. They know quite well and every one else knows that they will be of more value to their country in the positions for which they have been trained than if they were set to carrying Garand rifles. The rifleman will do the ultimate fighting, but he could not do it if he did not have the tools and, without the engineers, he would not get them. When the emergency is over the young engineer who has worked in his profession will be a more valuable man because of his experience under pressure.

"Of course they know that, too,"



P"PROMOTION depends to a large extent on seniority, for unfit men are sifted out by the usual processes of business. There are various categories in which this applies, such as technicians, station operators, skilled distributors, and the like. At the foot of the ladder are the muscle men, but they need not stay there if they have the equipment with which to climb. These promotions will make a little bother when the men come home."

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said the man. "If we could assure them the same protection, we could get the men we need. Perhaps we will be able to get deferment for them. If we do not—and this war emergency stretches out—and more men are taken for a possible 4,000,000-man Army, we will be in a very serious position."

Up to this place in the story we have been looking on the black side of the worst. The other side is the manner in which the utilities have been playing their part in the national drama. Unfortunately there is no central depository of information and the statements that follow are based on known facts in local utilities that have been questioned and the prevalent gossip in utility circles. Here and there may be an electric light and power company which has not made the generous provision for those of its employees who have been drafted that is the rule in the industry.

THE telephone and telegraph companies have followed that general rule, so far as I have been able to learn. Radio is a newer and more volatile industry, which in some respects has not found itself, and in certain other aspects has been puzzled by the recent order of the FCC that the national hook-ups shall be dissolved. In some stations the employees who have been called have been protected, as in the electric light and power industry. It has not yet been possible to say that a rule has been established.

Briefly—

When an employee of a utility has been drafted the company gives him his usual pay for three months, less the military pay and allowances. This is not the invariable rule. Some com-

panies may not be so generous, although I have not been able to hear of any which have fallen under this standard. His job is almost the most important thing in life to the average American. It means a steady income, marriage, children, and ultimate retirement with safety. The youngster who goes into the Army is presumably ready to give a year or more of his time and take certain physical chances for his country's sake, but he is not willing to suffer the loss of his job when he comes back. The first World War taught all the countries and the fathers of all the young men something about that. There is no more bitter taste in the mouth of the American Legion, even now, than the memory of workless days after the men of the AEF had been demobbed, while the men who had not gone to war were secure in comfortable jobs. There will be innumerable entanglements to be faced when the emergency ends and the country tries to get back to normal, and one of the most dangerous lies hidden in the lost-job question.

THEREFORE the utilities will take back their drafted men when they return from the Army, and with no loss of seniority.

There is no exception to that rule, I am told. No known exception, at least. Nor is any difficulty anticipated in taking in the returned men. During their absence their places have been filled, on a strictly temporary basis, by M. R.'s on the books, who are Military Replacements. It is to be expected that most of these M. R.'s will graduate into regular positions, for the life of this country will go on, war or no war, and electricity will be used and

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Effects of Expansion of the Army

"IF the Army expands into 4,000,000 men, and that is what the heads of the Army have been talking ever since the expansion began, following the lead of the heads in the administration, then the utilities will be in a dreadful mess. So will every one else, of course. To take 4,000,000 men out of the paths of peace and make soldiers of them would violently interfere with the lives of every one of us."



cables will be strung. Vacancies will be created by the factors that operate at all times—death, sickness, accident, buying a farm, marrying a girl who wants to move back to the home town. One of the larger companies has a payroll of about 35,000, and the annual turnover runs from 1,000 to 1,500, which makes it plain that the M. R.'s need not worry too greatly about their jobs when the emergency ends.

Meantime it is accepted that the draft process will compel a sort of musical chairs game in the local companies. If a drafted man has gotten his feet on the ladder of promotion, his call to the Army will mean that the man next below him will be moved up a notch. The utilities all work on a modified civil service plan. Promotion depends to a large extent on seniority, for unfit men are sifted out by the usual processes of business. There are various categories in which this applies, such as technicians, station operators, skilled distributors, and the like. At the foot of the ladder are the muscle men, but they need not stay there if they have the equipment with which to climb. These promotions will make a little bother when the men come home.

A DRAFTED man will be assured of his seniority—promotion and pay—but he may find the industry has moved during his absence. He has not been able to keep up with the procession. Although he will be given the promotion and pay he would normally have earned he may find himself handicapped. The utility chiefs have taken this into consideration and believe that time will iron out this particular kink. If the man has his job it will not take him long to stretch himself to fit it.

The interests of the drafted employee have been protected in other matters as well. That is merely good business, of course. Most if not all the larger utility companies have coöperative schemes of various sorts, maintained by the company and the employee. In the Consolidated Edison of New York, the largest company in the world in the matter of assets and the number of meters served, a group insurance plan covers sick benefits, medical and dental care, and a convalescent farm upstate on which invalids may regain their normal vigor. It is not possible for the draftee to come home from camp for treatment by his own doctor at company expense, but his in-

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terests are protected wherever they are affected by his temporary change of status. He cannot share in the social and athletic activities of his recent associates, a set of generals and top sergeants having taken over control of these things; but he is assured that his relation to the pension plan will not be affected by the fact that for some months he will be working for the Army instead of the company. He will not get his vacation from the Consolidated Edison this year, but at the end of fifteen years with the company he will be sure of his three weeks with pay in the summer, even if he did take a year or so off to go with the troops.

THE Consolidated Edison has no credit union, and that is the case with many of the larger companies; but it has, and many others have, a savings and loan plan and a mutual aid association. No encouragement is given by these aid associations—they are strictly coöperative—to young men who would like to borrow money with which to buy a wrist watch for a blonde, but if a man gets in a real jam they are helpful and understanding. Many of these larger companies operate group insurance plans, under which an employee can get from \$1,000 to \$10,000 protection on a joint payment plan. In the Consolidated Edison, at least, the company has taken over the payment of the entire premium during the Army service of the temporarily detached employee.

In one respect the utility companies in their dealings with their M. R.'s have been exposed to an embarrassment. Every well-run company always did know about all there was to be known about a man before he was

taken into the service. He must be safe, careful, dependable, and courteous or he did not get the job, for perfectly obvious reasons. The writer personally does not believe that any other industry can match the utility in the quality of its man power. The slightest mistake might result in a short circuit either in the power house or the legislature, and safety could only be secured by constant vigilance. This attitude of watchfulness has been stepped up immensely since it first became apparent that we might be drawn into the war.

"The plain fact is," said a general in the Army, "the country isn't at war yet, but the utilities are."

NO general the writer has been able to find will say, in private and strictly off the record, that he has the least fear that this country might be invaded. The newly created Office of Civilian Defense, with Mayor Fiorello La Guardia of New York city at the head, is frankly regarded by these old Army hands as a means for interesting the people in the war more than they have been interested as yet. They would dead-hand it to death, if they could. They fear that if the OCD really gets under way, and with La Guardia's capacity for huffing and puffing they suspect that it will get under way pronto, they will have earnest civilians in their Army hair at all times. Most of all, perhaps, they fear the helpful ladies of our great country. A helpful lady in full cry is, they say, one of nature's most awesome sights.

But the generals are just a little rattled about the utilities. "They are at war now," they say. "A traitor with a bottleful of acid or a hatful of metal

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filings might do damage we fear to think of."

The generals did not have to tell this to the utilities. The utilities thought it for themselves. Long before the Army got itself sufficiently untangled from its own troubles to offer any guidance, the utilities had taken all the necessary steps to guard their properties. Many of these precautions have been, for some incomprehensible reason, labeled military secrets, although they are in fact the most ordinary sort of common sense.

THE action of the Consolidated Edison may be taken as a pattern which has been followed by practically every one of the larger companies.

"Plants, machinery, and distribution systems are being watched night and day; special fences and gates have been installed; floodlights illuminate some of the properties after dark; elaborate precautions have been taken to prevent unauthorized persons from entering company premises; two hundred special policemen are on the alert for harmful activities; and the employees themselves are constantly being reminded of the important rôle they play in the company's smooth functioning."

No city could be deprived of light and power for more than a short time, thanks to the interlocking system which Senator George W. Norris may even yet look on as an "octopus," unless subversive elements were able to synchronize an attack on a number of cities. This is not regarded as even remotely possible. Nevertheless, threats are being constantly made against utility companies in most if not all of the larger cities. Many of these threats are in badly spelled letters on cheap paper, but the intent and the ability of the writers may not be measured by this fact. If a wave of enemy-inspired blackouts were to hit the larger cities, harm might be done in many different ways. Therefore there are to be no blackouts of this sort. In fact, as the generals said:

"The utilities are at war today."

DYNAMITE was found under a leg of a high-tension tower in Westchester county, New York. At three o'clock in the morning fire broke out in a coal conveyor tower at Waterside, and the bearings of a topping turbine were burned out. Other mishaps have taken place of which some might have been due to deliberate intent. No harm has been done as yet, but the Edison



"WHEN an employee of a utility has been drafted the company gives him his usual pay for three months, less the military pay and allowances. This is not the invariable rule. Some companies may not be so generous . . . There will be innumerable entanglements to be faced when the emergency ends and the country tries to get back to normal, and one of the most dangerous lies hidden in the lost-job question. . . . the utilities will take back their drafted men when they return from the Army, and with no loss of seniority."

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Company is taking all imaginable precautions. Coal and equipment deliveries are watched practically from the point of origin to the place of delivery. The names of the crews on coal barges are listed and checked off at both ends of a delivery, and the men are escorted on and off the boats. Where construction work is going on partitions are erected to divide the new area from the operating zone and only properly authorized men are permitted to work. Manholes are safeguarded; electric release devices have been fitted to doors and windows, and wherever a lock can be used it has been installed.

But none of these protective means

would be of any value if somewhere in a company's register the name of a "wrong" man were to be found. Allowing for the fact that the FBI and the other government organizations have, for perfectly good reasons, placed emphasis on the danger of sabotage, it still is the case that there is a danger. In other industries this has not been fully realized as yet, according to authority. The utilities do realize it and have taken steps. The man who wears the badge of a utility company on his breast nowadays may be accepted as a good deal of a man. He has taken a stiff examination and passed with honor.



Two Faces to Defense Head

"DEFENSE has two faces . . . One face is determined and aggressive. It is resolved to do the job of producing men and machines to make this country as strong in a military way as its responsibilities demand. This resolve is being carried forward by people who believe in the historical American method. The other side of the defense head is not so reassuring. It looks upon a group of men who are essentially state Socialists—men who would use defense as a means of attaining state socialism. . . .

"For one we will have to work constructively and do all we can; against the other we will have to fight with every weapon at our command. Unless we win the second battle, the success of the first effort will result in an empty victory, for state socialism in Germany or in America can mean only dictatorship."

—HAROLD STONIER,
Executive manager, American Bankers
Association.



Thinking Ahead of Disaster

Long before bombing became a hazard, the Los Angeles major disaster emergency council began planning against what might come in "Acts of God." Public utilities have been active in this work, because they are always hard hit in natural disasters. How the council and its plan have been extended to war's disasters.

By JAMES H. COLLINS

IN 1924, Fire Chief Ralph J. Scott, of Los Angeles, since retired, looked about to see what help he might be able to get in fighting a conflagration.

Los Angeles had, and still has, a good record for putting out fires before they get beyond control, but a rear-guard action is as much a contingency for a fire chief as a general.

Arrangements were made with neighboring cities for the exchange of apparatus and firemen in emergencies, and Scott discovered that there was a large private fire-fighting organization in and around the city—the oil companies, particularly, had good fire departments, and they were only one group.

Scott listed these facilities, and then went on to survey and list emergency water supplies, such as wells, lakes—even Hollywood's swimming pools; damage to water mains might make it vital to know where such reserves were

to be found quickly. And from that he went on to explosives, cutting torches, cranes, motor trucks, demolition equipment, with the men experienced in using them.

Of course, inquiries were made among utility companies, and the railroad, steamship, street car, telephone, telegraph, gas, and electrical companies, as well as the city's municipal light and power department, got very much interested. This idea of looking ahead, and preparing to meet the unforeseen, was new. But it sounded sensible.

"We would certainly be affected by a conflagration," said the utility officials. "Service would be disrupted; we would have to make quick repairs—we'd better come into your picture."

So, the Citizens' Preparedness Committee was formed to study this and other disaster hazards. In some cases, Chief Scott had to "sell" his idea, but the first set-up included the fire department, Southern California Telephone

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Company, Pacific Electric Railway Company, Los Angeles Chamber of Commerce, and various interested citizens. Some money was contributed to pay expenses—not much, for the project has never been costly. The utility companies assigned engineers to work on the project.

That was in 1926; and during the two years that followed, real progress was made. A survey was made of the city's entire resources for emergency use in disaster. The No. 1 potential disaster was flood, the next an earthquake, and the third a conflagration. Pestilence was also a possibility, for California had not long before gone through an outbreak of foot-and-mouth disease of cattle, necessitating complex quarantines, sterilizing, and the destruction of carrier animals.

IN the peaceful, booming 1920's, no thought was given to war or the bombing of cities!

In 1933, Los Angeles county had the first earthquake in its history that seriously damaged property, injured people, and made them homeless. This not only taught utility men many things about damage to facilities, restoration measures for service, and better design, but sharply stressed the need for preparedness.

A fireman had been assigned to give his full time to the disaster plan evolved by the utility engineers. He checked and coordinated their surveys, organized subcommittees to carry out details, and maintained interest. Basil E. Rice was the man selected; he has grown up with the plan; is now director of coordination for the council; and is the only city employee paid to devote all his time to it.

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The "quake" impelled the city council to pass an ordinance, already shaped by the city attorney's office, transforming the original preparedness committee into the Major Disaster Emergency Council. Thus the volunteer group, without authority, became a city bureau, with legal power to act in emergency.

In 1937, the city appropriated funds for constructing a headquarters building in Westlake park, where the fire department has its quakeproof alarm system, and for any disaster visualized at that time, this would be headquarters. War emergencies have made changes in plans, because where a civil disaster is best met by bringing homeless people together, at open spaces, for feeding, housing, and medical care, war requires that they be dispersed—but the fundamentals are still pretty much the same.

THE best way to understand this whole set-up is to imagine a sudden disaster, like an earthquake severe enough to start fires. In the 450-mile area of the city alone, there might be so many fires that it would be necessary to assemble the people in parks, playgrounds, and other open spaces, where they would be safe from fire and damaged buildings. Fifteen open spaces were selected, covering the city, and, until evil associations arose in connection with the term, these were called "concentration camps." They are now known as concentration districts.

Even while homeless people were assembling at these points, work would be under way.

Fourteen committees are charged with emergency activities—food, shel-

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ter, medical service, transportation, communication, and the like. Each committee is made up of volunteers, principally business executives and professional men, and keeps the records and skeleton organization needed for sudden mobilization.

Each committee has a chairman, with two alternates, because it is assumed that a disaster might find one of them missing, perhaps two, but hardly all three. Each would immediately make his way to headquarters, in Westlake park, and take charge of his particular work.

In the headquarters building, under Mr. Rice, all records are kept, together with emergency equipment. There is a complete telephone central station, ready to be plugged in. It was built and is maintained by the Southern California Telephone Company as part of its own stand-by equipment, and has never had any traffic, but within a few minutes it would be cut into the operating system, lines would be run to tents for each of the committees, and communication would be reestablished, assuming that regular telephone communication had been damaged.

As the people arrived at the different concentration points, some would be hurt, others sick, suffering from

shock—a certain number of births must be reckoned on in such times. Food, shelter, water, light, heat, cooking facilities, clothing, bedding, hospital facilities would be needed.

The medical committee, having for a dozen years studied the unforeseen situation from all angles, would proceed to mobilize and direct doctors, nurses, and medical equipment; the food committee would do the same for food, and so on.

Shelter would be one of the first necessities, and lists are kept of tents, building materials, and construction forces. The telephone and telegraph would be used to ascertain what was quickly available, and if near-by equipment and supplies had been destroyed, the lists would show other resources further out. In food, for example, constant record is kept of processing plants and warehouse stocks, and the lists at any moment will show how many loaves of bread are available from Santa Barbara to San Diego, how much milk, meat, and other provender. As damage to food plants was reported, a revised picture of the situation could be put together by the committee, which is made up of executives in that industry.

For emergency communication, the radio amateurs are organized, and headquarters has portable battery sets



I*"In England, the utilities have been so organized for war that interruptions to service are exceptional—lights may go out in a given area during a raid, but are almost immediately turned on again as new circuits are switched in. In Los Angeles, there would probably be no interruption, merely a 'click' as alternate supplies were automatically switched in. Defense factories, for example, have several alternate supplies of current."*

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to be taken afield—cutting off of electrical power would, of course, silence most of the home radio equipment in the present-day American city.

As supplies and workers were located, the transportation committee would find means of bringing them in, and within a few hours the population would be sheltered in tents and emergency huts, ready designed; fed from commissaries in charge of experienced people; protected with clothing, bedding; treated in emergency hospitals if necessary.

PLANNING has been carried on with a *major* disaster always in view; one that would damage buildings, make them unsafe, disrupt communication and transportation, and call for an organization broader in scope than the regular police, fire, and city departments, and agencies like the American Red Cross.

This viewpoint is really the key to the organization, because it is distinctly a coördinating agency, working to assist regular agencies should the need arise, but never duplicating their facilities.

At the very top of the council's functional chart are the constituted authorities of the city, county, state, and Federal government. They would be in command, and the council would assist them as far as necessary.

The council is directed by an executive committee made up of the mayor, president of the city council, and two other executives—at this time, an experienced railroad executive, for years president of one of the city's street transportation systems, and the general manager of the chamber of commerce, qualified because he is in con-

stant touch with the business community.

The 14 committees charged with major activities are under the executive committee, and there are nearly 100 subcommittees of various kinds, organized by the major committees to do various kinds of work.

For example, food is in charge of the committee on the necessities of life. The present chairman of that committee is a food broker; his alternates are a Red Cross officer and a Salvation Army brigadier. Subcommittees are most competent to keep active lists of different food supplies ready at all times, and, by splitting up such details, they are given specialized attention, and the volunteer work is least burdensome to the businessmen who serve. The mainspring of the whole organization is specialized volunteer service.

FIVE of the committees that would be first called upon are made up of city, county, or other officials—water, streets, medical, fire, and law and order. The intelligence committee is also under the fire department, and is headed by Mr. Rice, the coördinator.

In the event of disaster, the law and order committee would be one of the first in action. The chief of police, its chairman, would have authority in the city, and the sheriff in the county territory. An Army Reserve colonel and a judge are alternates on this committee, but known as liaison officers. The committee would act under plans made for the coöperation of the California State Highway Patrol, the Army, National Guard, Reserve Officers (ROTC), the Naval Reserve, and other organizations capable of

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Organization for Defense

"POLICE and fire organization for defense dovetail into disaster plans in many ways. Volunteers would be needed as deputies, air-raid wardens, auxiliary fire-fighters, first-aid workers, sabotage patrols, traffic officers, rescue parties. The skeleton organizations already set up by the council's committees, to mobilize veterans and others, wherever needed, whether the emergency called for maintaining law and order, or a job of carpentering, have proved of utmost value."

helping restore order and enforce laws.

The fire committee, staffed by fire department officers, is especially organized for emergency work. Its records include lists of emergency water supplies, private and near-by municipal fire-fighting equipment, supplies of explosives, location of hazardous materials like oils and chemicals, and available demolition, blasting, hoisting, and other equipment owned by private concerns.

The water committee, under water department officials, has made extensive plans and installed considerable special equipment for shutting off water in the event of bad breaks in mains, and for by-passing and isolating badly damaged areas, and restoring service—its whole personnel is trained for emergency duty.

The street committee, under the city engineer and two assistants, has plans for clearing débris, assisting in rescue

work, grading and oiling emergency streets in the concentration communities, assigning dumps, opening up routes for transportation of food and materials, and mobilizing mechanical equipment owned by private concerns.

The medical, health, and sanitation committee is under the city health officer, with two prominent physicians as alternates, and has surveyed hospitals and listed medical supplies, doctors, nurses, ambulances, and similar requisites.

BEING under the city government, the activities of these five committees would be financed out of tax funds in case of a disaster. The question of who is to pay for any specific work or material has been found a very important part of disaster planning. Some disaster activities would be financed by public contributions, and, for such financing, funds of or-

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ganizations like the Red Cross would be made available and, if necessary, additional funds would be raised by a drive, authorized by the Red Cross, in accordance with its own regulations, under Federal charter.

Two of the most important committees, communication and transportation, are staffed by utility men, and have made complete plans for mobilizing all available emergency facilities, as well as installed considerable special equipment, and carried on special engineering work.

Communications are under two telephone officials, heading the committee, with a professional man as present alternate, and include telephone, telegraph, commercial, and amateur radio stations, and auxiliary services, such as the Boy Scouts, for messenger duty in emergency.

The special telephone facilities in Westlake park have been designed to link headquarters with the different concentration points, as well as connect headquarters with the general telephone system. There are two lines to each camp, with a magneto switchboard, and two radio transmitters, of 1,000- and 500-watts capacity, for use with portable transceiver sets at each camp, in the event of other communication being put out of service. The portable sets — 20 of them — are kept in the homes of experienced men living near the different camp sites, and, if required, these men could quickly establish radio communication with headquarters. Other portable sets are ready at headquarters.

IN 1938, Los Angeles had some torrential March rains that caused flash floods, and gave the disaster organization a partial dress rehearsal.

Such rains come quickly; the heavy downpour runs off through the mountains; quick floods occur in areas not yet protected by the extensive control system being carried out; and people are made homeless. Regular city and county departments were able to care for all needs, but the disaster organization was partially mobilized and stood by.

These floods were of special value in pointing out needed improvements in the emergency communications plan. For telephone lines to points outside the city had been built underground along state highways, in the belief that an underground line is least liable to damage, and that state highways furnish the safest routes.

The floods carried out some bridges, and with them the underground telephone lines. Whereupon, telephone engineers rebuilt their underground lines on piles, so that flood washing out the soil would leave aerial lines.

The transportation committee is at present headed by the president of a street railway company, with two railroaders as alternates, and is organized to utilize street car, railroad, motor transit, motor bus, taxicab, air transport, motor truck, and steamship companies' equipment—a set-up calling for an enormous amount of detail work, and constant revision of records.

OTHER activities are in the hands of committees on rescue, shelter, necessities of life. The Red Cross, personnel, rehabilitation and finance, with the intelligence department, are under the coördinator.

Rescue is at present under a physician, also a member of the board of

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education, with a construction materials dealer and real estate executive as alternates. It is closely linked to the Red Cross, and would have charge of first aid, rescue and searching, setting up first-aid stations, assisting police and firemen, getting disabled persons to hospitals, and homeless people to shelters.

Shelter is at present headed by a building contractor, with an architect and Red Cross official as alternates, and the committee has designed a standard type of temporary building which can be quickly erected by semi-skilled labor, from a wide range of materials. Blue prints and material lists, with plans for each concentration community, would make it possible to get started in a matter of hours, and camp plans cover sanitation, drainage, electrical wiring, portable lights, stoves, fuel, and everything needed. Tools, tents, fencing, and sources of skilled labor are listed in readiness for what may come.

The committee having charge of the necessities of life maintains the largest system of records, because it covers, and keeps up to date, the food, clothing, bedding, cooking, and commissary equipment available in the whole southern California area, with lists of the larger stocks available as far as San Francisco.

To illustrate, a disaster would create an immediate emergency demand for food, and sandwiches might be the first thing needed. From its lists, the man heading that committee would be able to locate bread, because he knows where every bakery is located for a hundred miles around, and, if one area were devastated, could turn to other supplies. Similarly, he could locate cooked meats, uncooked provisions, cooking equipment, clothing, blankets — whatever was asked for. The constant normal changes in processors, warehousemen, stocks on hand, and the like may easily be imagined, and they are kept track of in the constantly revised lists.

The Red Cross committee, headed by the chairman of the Los Angeles chapter, and two attorneys as alternates, is coordinator of five other committees—necessities of life, shelter, finance, rescue, and rehabilitation. The Red Cross is prepared to furnish funds for these activities, as the governmental authorities provide finances for police, fire, and other public services. For that reason, the Red Cross undertakes much of the direction of those committees' work. Procedures have been standardized by years of experience, and are laid down in the Red Cross Manual.

The personnel committee is made



Q "WHILE the city of Long Beach, 20 miles from the center of Los Angeles, is in Los Angeles county, and therefore included in many details of the Los Angeles disaster plan covering the county, it has set up a separate disaster council, with a smaller number of committees. While similar to the Los Angeles organization, it came into being after the 1933 TEMBLOR, which did its heaviest damage in and around Long Beach."

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up of American Legion and exservice groups, is under Legionnaires, and would act principally in mobilizing man power through its statewide organizations. If the shelter committee needs carpenters, or the transportation committee motor truck drivers, they will be supplied from membership or by calling in outside aid. Exservice men will be especially valuable as assistants to the police, because they are disciplined. Knowledge of where to quickly obtain men qualified for many sorts of work, and facilities for obtaining them outside the exservice organizations, is vitally important in this committee's work, and is all a matter of records which can be used by whoever takes charge in an emergency. Labor will, of course, be paid for out of taxes or privately contributed funds.

REHABILITATION of individuals and families is a job that starts immediately after any disaster, and sometimes continues for months, until victims are again on a self-supporting basis. The Red Cross is the national agency for such work, is trained and equipped for it, and quasi governmental in character. So this committee is headed by a Red Cross official, with businessmen as alternates.

The finance committee is headed by a Red Cross official, an attorney, and an insurance man, and would have charge of any drive for funds decided upon as necessary by the executive committee.

The intelligence committee maintains all records in files at headquarters, sees that information is kept up to date, coördinates the work of different committees to avoid duplication

—in short, keeps the whole organization alive and ready to function. One section of this committee is responsible for the establishment of concentration areas; another has charge of publicity and public information; another is made up of airplane pilots who have planes equipped with cameras for taking air photos of devastated areas; still another attends to office supplies for the different committees, and so on, and so on.

THIS whole set-up was framed in City Ordinance No. 73,309, so that the duties and authority of each committee are clearly defined. On "D" day, the mayor would notify the members of the emergency council, and they would proceed to handle the situation, making rules and regulations.

The question constantly before the committees is, "What would be done if such-and-such should happen?" and, if the contingency has not been covered, the committee best equipped by experience to handle that particular situation holds meetings to discuss ways and means, asking for assistance from other committees, making suggestions to them.

The only meetings are those of the committees. The council as a whole has none. It is largely a legal framework upon which the committees are arranged.

Committee work is nine-tenths stock-taking of resources that would be needed in disaster, with flexible plans for using those resources, and much of it is in charge of committee-men's employees, who make surveys and keep lists up to date. In practically every case, this work is regarded

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Consideration of Disaster Plan

"DURING the past ten years, many visitors in Los Angeles have investigated the disaster plan and admitted that something of the kind would be a good thing for their own communities. Until the new war came, however, no very definite start was made elsewhere—and now war has set every community thinking about what it would do if bombed."

as of sufficient importance to the committeeman's own business to warrant its being done and paid for by his concern. For it is just as vital to the food manufacturer or wholesale equipment dealer to get his business going again promptly after a disaster, as it is for a public utility corporation. Where emergency equipment is provided, as in the case of the utility companies and the municipal department of light and power, it is regarded as insurance against interruption of service, and in every case has proved cheap insurance.

THE council as a whole, and individually, believes that it could function under adverse circumstances, and as fast as the shape of the present war in Europe has been disclosed, in the destruction of Poland, the invasion of France, and the bombing of England, has applied the emergency conditions to southern California and studied the steps that would have to be

taken by each of the committees, should war come.

It has been decided that the original disaster plan and set-up is the most practical for war defense. The situation is the same with respect to housing the homeless, caring for the wounded, reorganizing communication, transportation, commissary, police. Knowledge of where to get food, clothing, medical supplies, and equipment would be the same.

However, air raids would necessitate scattering people instead of bringing them together, and there would be a need for additional facilities, such as air-raid warnings, shelters, and patrols.

The effects of a bomb are comparable with those of an earthquake, with the advantage that bombing can be anticipated.

There is the same destruction of buildings and injury to people, the same need for rescue, shelter, food, medical care, policing, fire-fighting,

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resumption of services—right down to rehabilitation.

ONE of the first studies made for air-raided protection was of possible shelters, to which people could go, and be scattered. Storm drains, street underpasses, tunnels, and similar refuges have been listed and mapped, among them several thousand reinforced concrete buildings suitable for raid shelters.

For raid warnings, all sirens have been listed, and a system covering the whole county has also been designed by telephone engineers. At present, this would comprise about ninety sirens of such power that they could be spaced 2 miles apart in the business district, and 3 to 4 miles apart in residential areas. The system would necessitate changes in police, fire, and other sirens, probably the adoption of a different tone, to avoid confusion. This is one of the details in which coöperation with the Federal government is necessary, and the committee findings and recommendations, passed along to county authorities for action, are taken to Washington.

Another important survey, made by a subcommittee, lists all possible bomb targets, such as military bases, air fields, oil refineries and tank farms, aircraft factories, transportation and communication lines, power stations, airplane range beacons, highways, harbors, reservoirs, water mains, fuel gas tanks.

In England, the utilities have been so organized for war that interruptions to service are exceptional—lights may go out in a given area during a raid, but are almost immediately turned on again as new circuits are switched in.

In Los Angeles, there would probably be no interruption, merely a "click" as alternate supplies were automatically switched in. Defense factories, for example, have several alternate supplies of current.

THE utility services have been surveyed from this viewpoint, and where they might be interrupted by the bombing of a single trunk line, steps are being taken to connect alternate lines. Their war defense pattern is a spider web, from which as many strands as possible might be eliminated, leaving alternate lines for uninterrupted service. To completely disrupt service, it should be necessary to "get" the spider.

"Blackouts" are one of the first devices that come to mind in connection with air raids, and popular opinion welcomes a rehearsal.

However, studies by a committee, in coöperation with military authorities, indicate that the "blackout" may be outmoded, and that rehearsals would serve no good purpose. Should experience favor it, a special technique would be developed, and under no circumstances would power be shut off at generating stations, because this would interfere with hospitals, communication, and other vital services, and be likely to cause panic.

Instead of the "blackout" there might be a "light-up" scheme for camouflaging targets, with changing patterns of light concealing important targets from the air, or blinding beacons of great power. This whole situation is changing rapidly, with changes in aircraft and air tactics, and is more in the field of defense than of disaster organization. But it has importance in

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preventing panic and minimizing disaster.

POLICE and fire organization for defense dovetail into disaster plans in many ways. Volunteers would be needed as deputies, air-raid wardens, auxiliary fire-fighters, first-aid workers, sabotage patrols, traffic officers, rescue parties. The skeleton organizations already set up by the council's committees, to mobilize veterans and others, wherever needed, whether the emergency called for maintaining law and order, or a job of carpentering, have proved of utmost value.

Defense problems have shown that the original disaster plan is extremely flexible.

For example, evacuation of cities has been considered as one resource in air-raid protection. The suggestion might have arisen in a disaster committee, or be originated by city or state authorities, or be developed as part of military plans.

Evacuation would call for every form of transport, with provision for food, shelter, medical care, and the like. The different committees either have the information needed, or are best equipped to get it. They can simply furnish information, or stand ready to go further in coöperation. There is never confusion about authority, or duplication of effort, for the city ordi-

nance is clear, and the official coördinator has oversight that enables him to call attention to duplication in the work, which has generally been unintentional.

DEFENSE protection, rescue, and rehabilitation bring in a new factor—publicity.

Few people in the Los Angeles area had heard much about the disaster plan until bombs were dropped on London. The plan implied earthquakes, and recalled the hysterical headlines of 1933. There was nothing that the public could do to help the job along; it was one of those housekeeping things best left to experts, working quietly. So the disaster plan was seldom "written up." Anybody interested could get all the information available, and public officials from other communities did come to investigate. Otherwise, the attitude of the planners was, "Keep out of my kitchen!"

Had a Los Angeles newspaper published an article on needs for mass burials in the event of bombings, there would have been fear and resentment.

Yet recently the sheriff called attention to this contingency; the newspapers reported the facts, and there was no public reaction. Newspaper readers expect to be told what is necessary, and publication of details about sirens, shelters, and similar preparations is



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more reassuring than alarming, because it shows that preparations are being taken care of.

With the onset of actual danger from bombs, the public would want to be more fully informed, to assist by coöperation and intelligent action. The council reasons that such a situation would be national, and that publicity would be taken care of by the Federal propaganda agencies.

WHILE the city of Long Beach, 20 miles from the center of Los Angeles, is in Los Angeles county, and therefore included in many details of the Los Angeles disaster plan covering the county, it has set up a separate disaster council, with a smaller number of committees. While similar to the Los Angeles organization, it came into being after the 1933 *temblor*, which did its heaviest damage in and around Long Beach.

Until last January, when a new city manager took office, the council was principally a volunteer fact-finding group, conducting surveys of hazards and resources. City Manager Carl R. Erickson automatically became the executive head of this organization, and, in the event of disaster, would be in authority, with the city hall as the assembly place. Therefore, he asked the council to include war-time problems in its work.

The set-up is the same, with a committee of public safety, the largest of

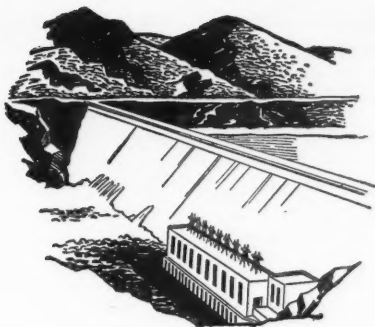
9 committees, which would coöperate with the police, fire, health, and public safety departments of the city government, mobilizing additional guards, fire-fighters, and air-raid wardens, assisting in rescue work, and so on.

During the past ten years, many visitors in Los Angeles have investigated the disaster plan and admitted that something of the kind would be a good thing for their own communities.

Until the new war came, however, no very definite start was made elsewhere — and now war has set every community thinking about what it would do if bombed.

AT the present moment, there are many plans put forward by many organizations the country over, with considerable confusion. Out of the public interest will probably come a master plan, such as is being sought by the National Advisory Council on Home Defense. Such a master plan will enable communities to adopt what has been found good in the Los Angeles and Long Beach plans, without going through the years of preliminary studies that have brought them to their present development. And a master plan will do for other communities what it has done for these cities — bring every kind of organization, and every kind of necessary preparation, into a general plan, with order replacing confusion.

Q THE Northwestern Bell Telephone Company is using an ingenious method of taking care of long-distance calls in areas where lines have been torn down by storms. It sets up radios at ends of the wires and messages are sent between the breaks. Use of this method was necessary recently in western Nebraska, one radio being in Ogallala and the other at Chappell. Users were informed in advance, however, that every short-wave receiving set in town could listen in, there being no way to black them out.



Defense for the Utilities

Proposed legislation to provide service penalties
for sabotage of "national defense utilities"
during any emergency

By ANDREW BARNES

"BOMBPROOFING communications centers, shelter for personnel and plant facilities"—you will find that language, backed by tens of millions of dollars in cash, neatly sandwiched into the national defense appropriations bills in very inconspicuous places. The government is preparing against an emergency growing more serious with each day.

At all of its insular naval and air bases—Samoa, Guam, Hawaii, and dozens of places—it is bombproofing its life lines, its gasoline storage depots, and the nerve centers of the national defense system. No one can predict when those shelters may not be needed.

It is essential that these outposts of national defense have the utmost protection. It is equally essential that the bombproofing be extended back behind the lines so far as it is needed. Far be-

hind the military and naval outposts, the government is moving in a different fashion to bombproof, by law, the vital arteries that supply the food, the munitions, power, and sinews of war for those defenses.

Prompted by the Department of Justice, the government has recognized that a bomb planted by saboteurs one thousand, two thousand, even three thousand miles away from the front line may be even more damaging than a 500-pound demolition bomb dropped on an island outpost in the Atlantic or the Pacific. America's gigantic strength lies not in an imposing Army, a big Navy, or a huge airforce. Instead, it rests squarely upon the unmatched industrial production of the nation, the endless raw materials, the power to convert them into munitions. At the Department of Justice's request, the House has before it a measure

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drafted to meet precisely any sabotage aimed at the nerve ganglia of defense production. The bill is sponsored by Representative Francis Walter, and undoubtedly will be sent to the Senate for its approval before long. It would use the 1918 antisabotage law as the vehicle for bombproofing the U. S. industrial machine, the fuel supplies, utilities, and vital cogs on which this machine must perform.

THE 1918 law with its stern penalties applied only in wartime. In 1940, the administration conceived that in a period of emergency, when defense preparations are being rushed to the utmost, protection was no less vital to the nation than during actual conflict. Therefore it asked, and Congress approved, legislation amending the 1918 act to provide \$10,000 fine and ten years' imprisonment for sabotage of "national defense utilities" during any emergency.

This 1940 amendment was thought to be broad enough to cover all types of utilities, under every conceivable condition. National defense utilities were defined broadly and generally—purposely. Congress said they should include:

All railroads, railways, electric lines, roads of whatever description, railroad or railway fixture, canal, lock, dam, wharf, pier, dock, bridge, building, structure, engine, machine, mechanical contrivance, car, vehicle, boat, or aircraft, or any other means of transportation whatsoever, whereon or whereby such national defense materials . . . are being or may be transported either within the limits of the United States or upon the high seas; and all dams, reservoirs, aqueducts, water and gas mains and pipes, structures and buildings, whereby or in

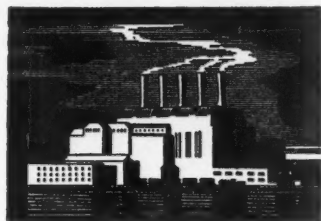
connection with which water or gas may be furnished to any national defense premises, and all electric light, steam, or pneumatic power, telephone and telegraph plants, poles, wires, and fixtures, and wireless stations, and the buildings connected with the maintenance thereof used to supply water, light, heat, power, or facilities of communication to any national defense premises or to the military or naval forces of the United States.

CONGRESS, having enacted this legislation, was confident that it had used terminology so general that all possible contingencies were covered to the nth degree. This confidence appeared to be fully justified by the sweeping provisions of the law.

However, after a careful study of sabotage developments and the 1940 law, the Department of Justice asked Congress to strengthen the statute. It was possible to conceive, said the Department's attorneys, of instances which the new law would not cover. They cited the power lines not immediately connected with national defense use, but supplying, nevertheless, an important source of stand-by power for emergencies. Suppose they were dynamited? Or a hydroelectric dam far up in the mountains, indirectly important to national defense? Or a steam power plant likewise situated? Or a railroad hauling coal for a blast furnace devoted to the manufacture of steel for armor plate? In each case, the utility would be only indirectly connected with national defense, but its part would be vital.

The Department asked that the law be amended to define national defense material to include a list of generalized products and commodities, and "*All other articles of whatever description*

DEFENSE FOR THE UTILITIES



The Solar Plexus of the Industrial East

"THE Mahoning valley, with its gigantic aggregation of industrial enterprise, is commonly called 'America's Ruhr.' Here, in a 30-mile area from Newton Falls, Ohio, to the Pennsylvania state line, are concentrated more than one hundred vast industrial plants: steel mills, factories for production of alloys, factories for the manufacture of electrical equipment, rubber tires, compasses, castings, machine tools, and a thousand other products."

and any part or ingredient thereof, intended for the use of the United States" in connection with national defense in any way whatever.

THIS, it would seem, is an ambitious attempt to blanket the universe in twenty words of law. Actually it is not. The American industrial machine—as shown by recent strikes—is built with the precision of a watch. Each cog depends upon a corresponding cog in another part of the machine. You cannot take the balance wheel from your watch, throw it away, and expect to arrive at the office on the dot at 9 A.M. each day. When strikes tied up plants producing airplane castings, the entire airplane industry came to a virtual standstill.

Likewise, when sabotage hits at the solar plexus of America's industrial machine — its sources of power and raw materials—the damage must in-

evitably be serious. A study of industrial sabotage shows that the damage is incurred not so much within the plants themselves as in the more remote, but no less vital, cogs upon which these plants depend.

The Mahoning valley, with its gigantic aggregation of industrial enterprise, is commonly called "America's Ruhr." Here, in a 30-mile area from Newton Falls, Ohio, to the Pennsylvania state line, are concentrated more than one hundred vast industrial plants: steel mills, factories for production of alloys, factories for the manufacture of electrical equipment, rubber tires, compasses, castings, machine tools, and a thousand other products. It might be called the solar plexus of the industrial East. There is one reservoir along the Mahoning, Lake Milton, holding 9,000,000,000 gallons of water. This reservoir serves in drought periods to sustain the flow of

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the river to that level required for the operations of the manufacturing plants. It contributes indirectly to national defense production, but the protective cloak of the antisabotage law is not thrown around it, although its contribution to defense is undoubtedly of great importance.

THE mayors of Mahoning valley cities have petitioned Congress to construct additional stand-by reservoirs, rather than depend upon this one alone. Mahoning valley manufacturers have likewise urged Congress to take action.

"Mahoning valley has its fingers crossed," these officials said in a petition presented to Congress. "If the one and only reservoir—Milton dam—should be sabotaged, or if the summer of 1941 should be unusually dry, it could not make the contribution it is now making or the contribution it is expected to make to national defense. The Mahoning valley is one of the chief sources of supply for all items of national defense. Without steel there can be no airplanes, motors, guns, battleships, tanks, or shells. The crippling of the Mahoning valley means the severing of one of the main life lines of national defense."

They might have added, with justice: "This is the weak spot in our armor. One reservoir, a great industrial area wholly dependent upon it, and this reservoir unprotected by Federal law."

The Walter bill, when enacted into law, will give all protection the Federal government can afford to this vital reservoir. It will give protection to hundreds of similar facilities scattered throughout the United States—to

power substations, to transmission lines, to generating units, to transformers, to pumping stations along pipe lines, to railroad facilities, to communications cables. Known to the Department of Justice are hundreds of instances in which such legislation is essential to give the protection required.

THE Federal Power Commission has urged the utilities to take every possible precaution themselves for their own protection, and the utilities have responded. But their efforts alone are not sufficient. Sabotage—the fight against it—is too big a job for any one industry, or any one agency within the government.

The utilities cannot afford to fall down, after a brilliant start, on their part of the national defense job. There is no indication that they will. Therefore, it behooves them to see that no subversive group has opportunity to sabotage their efforts. The Walter bill, when enacted, will reinforce the utilities against any effort to undermine their contribution. In effect, it will bombproof them. That is why they should, without delay, encourage Congress to speed this legislation to final enactment, without allowing it to get lost in the horde of less important but, on the surface, more imposing bills.

A saboteur who strikes directly at a national defense plant incurs the full penalty of law, and can hope at best to do only superficial damage to the entire output. If he knows his job, he strikes at something bigger—the sources of power and raw materials.

When the British fleet shelled the Italian port of Genoa recently, it struck for—you guessed it!—the utilities.



Wire and Wireless Communication

THE independent telephone industry was not a formal party to the recent toll rate investigation of the FCC which ended in the \$14,000,000 long-distance rate reduction by the Bell system. However, it may benefit considerably from the forthcoming FCC conferences and studies on long-distance rate structure which will include, among other things, consideration of the division of toll compensation between participating carriers. In its announcement of the \$14,000,000 rate adjustment, voluntarily agreed to by the AT&T and associated companies, the FCC press release stated in part:

The commission announced that it expected the American Company to assume all reductions in revenue brought about by these reductions in interstate schedules in which Long Lines is a participating carrier, and that arrangements should be made with associated companies and independent connecting companies so that these reductions would not affect revenues of the latter two groups.

This was seen as a virtual invitation for the independents to come in and sit with the FCC and AT&T in an effort to arrive at an equitable solution to the problem. Heretofore, Bell contracts for toll compensation have varied considerably among the different independents. The nature of the toll business is such that a uniform contract for the division of toll revenues would be impractical, because of differences in traffic, local conditions, etc. However, some formula for working out classifications which would give all independents similar treatment may come out of the proposed FCC conferences.

REACTION of the National Association of Railroad and Utilities Commissioners to proposed participation of the state commissioners with the FCC in studies on telephone toll rate structure was also seen as favorable. Early in June a committee of the NARUC met with representatives of the FCC special telephone bureau and it was generally expected that some procedure for cooperative action between the two groups would be forthcoming.

Another feature of the recent AT&T rate cut was the concentration of the reduction on two classes of toll business: (1) overtime charges; (2) long-distance calls between 144 and 1,530 miles. National defense appears to be the reason why this relatively narrow field was selected for applying the savings. The FCC did not want the new reductions to stimulate more civilian long-distance traffic. It might get in the way of national defense activity or demand new construction of facilities which might be better applied to other purposes. It was felt that the reduction on overtime and on medium long-distance calls would be least likely to provoke any drastic or unwelcome increase in telephone long-distance business.

Another development of interest to the independent telephone industry, as well as the Bell system, was the dissatisfaction of utilities generally with the low priority rating given for new construction work with respect to participation in available aluminum supply. The telephone industry, along with the electric

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and radio industries, was given a B7 classification, which is quite low — just one step above the lowest rank, B8, which is for aluminum pots and pans. Of course, replacement and maintenance of existing vital service will be taken care of under a B2 rating. And any new work done for Army camps or other industries directly connected with national defense work would be given even a superior classification. However, the B7 rating is applicable to all other new installation. In view of the increased general business activity, new civilian installation demands are rapidly depleting equipment inventories.

TELEPHONE companies are not so much concerned about aluminum because there is not enough aluminum left over from direct defense work to make much difference what kind of a classification a particular industry might receive. Priority for aluminum is just a name. There is virtually none available.

But it is feared that the pattern set by the Office of Production Management in rating industries for participating in the aluminum supply might be followed in other strategic materials which might hit the telephone industry much harder, notably copper and nickel.

In a telegram dispatched from Tampa, Florida, on June 9th to E. R. Stettinius, Jr., director of priorities of the OPM, Carl D. Brorein, president of the United States Independent Telephone Association, stated:

Permit me to bring to your attention the serious situation confronting the independent telephone industry growing out of restrictive priority rating of B7 on aluminum for civilian communication equipment. There are 6,500 independent telephone companies not a part of the Bell system that operate 12,000 telephone exchanges mostly in small towns. Those companies in subscriber stations represent roughly one-fifth of the nation's entire telephone industry. Gravity of situation to telephone industry is accentuated by recent OPM statement that only 5 per cent of total aluminum supply can be used for all civilian purposes, and that telephone companies are being strongly urged to increase their facilities in order to enable wider telephonic coverage necessary under critical conditions affecting

country. The B7 rating is seriously hampering our efforts. Will you not please reconsider present rating and make materially higher rating in harmony with indispensable nature of telephone communication? We also understand that copper and nickel are soon to be placed on priorities list and these two items, especially copper, are essentials in maintenance of existing telephone facilities as well as extension of plant to meet community communication requirements, including many items directly concerned with defense.

THE electric industry has already voiced its concern over the B7 aluminum rating assigned to electric utility equipment. The radio manufacturers have also shown dissatisfaction. James S. Knowlson, president of the Radio Manufacturers Association, said in Chicago on June 10th that although radio "is one of the most merciless weapons of modern warfare" it has been ranked "midway between toothpaste and hair tonic" in the defense program.

Citing Hitler's use of radio to "rouse his country," Knowlson stressed the value of radio in maintaining morale, disseminating news, and "forming public opinion." He said the tide "is going against us for any expectation of continuation of business as usual. And we might just as well realize it."

Probability of industry-wide curtailment of radio set and equipment output later in the year as the shortage of essential raw materials becomes more acute was the major topic of discussion among early arrivals for the Radio Manufacturers Association's annual convention. Consensus among manufacturers' representatives was that radio plants will be hard put to turn out enough equipment to maintain the industry at its present level of efficiency, to say nothing of trying to satisfy the near-record demand for new commercial receivers and broadcasting supplies.

Prospect of early imposition of priorities on zinc will add one more problem to the list of worries which were to be aired in committee sessions. Already shortages of aluminum, zinc, lead, and other metals widely used in the manufacture of receivers, transmitters, tubes,

WIRE AND WIRELESS COMMUNICATION

condensers, and coils have caused headaches. Cabinet output, too, is being affected by production difficulties in the furniture industry and by threatened shortages of certain types of plastics.

Some manufacturers say that a fair percentage of their current production is going directly to the government for Army and Navy signaling and communications needs. Others have obtained subcontracts for making munitions or ammunition components on some of their machines.

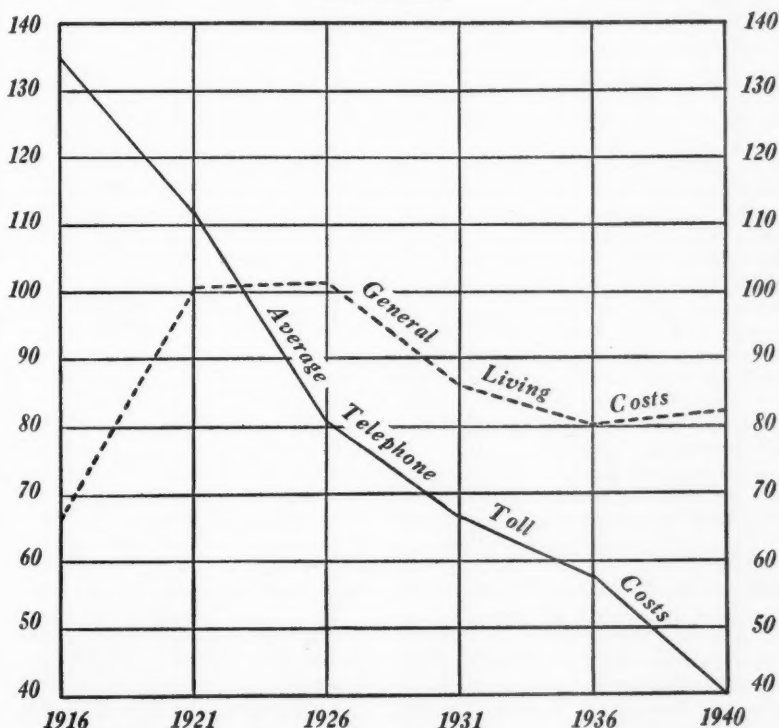
While no formal discussion as to the possibilities of further diverting tools in

radio plants to armament production was scheduled on the convention program, it was understood that representatives of the OPM's defense contract service would talk informally with manufacturers to get a line on additional capacity for handling primary orders or subcontracts.

* * * *

A SHORTAGE of workers is raising labor costs of Postal Telegraph, Inc., Edwin F. Chinlund, president, told stockholders at the first annual meeting of the company last month, which was

QUARTER CENTURY TREND IN LIVING COSTS COMPARED WITH TELEPHONE
LONG-DISTANCE SERVICE COSTS IN THE UNITED STATES
(1923-25=100)



Source: Living costs from United States Bureau of Labor Statistics for 51 cities. Toll costs adjusted from recent AT&T annual report showing average week-day station-to-station charges between 25 largest cities.

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formed in reorganizing its predecessor, Postal Telegraph & Cable Corp. Postal has lost some employees to defense industries and thus far has not obtained replacements, Mr. Chinlund explained, and therefore must pay substantially more wages at time and one-half rates to handle increased business. The personnel training program which Postal set up last year would provide the system with the additional workers it needs in a short time, he added, but pointed out that the higher pay offered in defense industries is more attractive than the wages the telegraph company can afford.

His remarks were in answer to a stockholder's query why Postal was able to translate only 30 per cent of its increase in gross over last year into net operating income, whereas Western Union Telegraph Company has succeeded in preserving 50 per cent of its gain in revenues for stockholders.

Postal is installing more efficient apparatus in 39 of the largest cities, Mr. Chinlund reported.

Discussing the possibility of a merger with Western Union, Mr. Chinlund reported that there had been general agreement in testimony at Senate Interstate Commerce Committee hearings that consolidation of these two concerns would best solve present problems in that branch of the communications field. He stated that the Wheeler committee's hearings on radio broadcasting policies had delayed decision concerning advisability of enacting legislation to permit the merger.

Referring to his statement in the annual report to stockholders that although Postal had sustained a net loss in 1940 of \$2,791,491, its actual cash loss was \$317,000, Mr. Chinlund stated that the \$694,792 loss from operations during the first four months of this year had incurred a cash loss of only \$483,000.

Stockholders elected nineteen directors who were appointed to serve during the company's first year by Federal Judge Cox.

The Senate committee, which recently closed merger hearings, was expected to recommend "permissive" legislation.

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FOLLOWING testimony by Chairman Fly defending the recent FCC new work curb on radio, and Commissioner Craven's doubts about it, the Senate Interstate Commerce Committee listened to attacks on the same from the broadcasters.

President Niles Trammell of the NBC on June 18th testified against new rules governing the 503 radio stations affiliated with coast-to-coast networks. Mr. Trammell and President William S. Paley of CBS on June 17th charged the regulations would radically alter American radio programs and "disastrously affect broadcasting. Senator Wheeler of Montana, chairman of the Senate committee already has shown some favor to the FCC majority position.

The Mutual Broadcasting System favors the rules.

The committee is considering a resolution by Senator White, Republican of Maine, to investigate FCC rules and the reported need of overhauling radio laws.

Mr. Trammell on June 17th repeated Mr. Paley's charge the rules would favor Mutual over the two older networks by prohibiting exclusive contracts with station affiliates. The change, he said, would permit Mutual to "raid" CBS and NBC stations.

Under the rules, NBC would be required to dispose of one of its two networks. Networks would be barred from writing exclusive contracts with stations. Stations would be entitled to pipe in programs from another chain on time not used by the network with which it ordinarily is affiliated. And all contracts would be limited to one year, instead of the present five years.

Mr. Trammell charged the FCC revision would transfer control of radio from stations and networks to the FCC. "The changes," he said, "are not the result of public demand or a deficiency of service. They are the result, apparently of unproven charges of domination, control, and monopoly. They stem from the competitive cry of those who seek through commission edict and without competitive effort, to replace the pioneers who developed our American system."

Financial News and Comment

By OWEN ELY



Chairman Eicher's Address

CHAIRMAN Eicher, newly appointed head of the SEC, was, at his own request, invited to address the recent EEI convention. Instead of bearing an olive branch, however, as some had expected, he delivered a statement highly critical of holding company systems. (See digest on page 37.) In effect, Chairman Eicher charged holding company executives with: (1) using the defense program as an excuse to seek deferment of integration; (2) instilling fears in investors' minds regarding the effects of integration on security values; and (3) in some cases curtailing or postponing needed expansion, due perhaps to fears that their interests might be endangered by bringing in outside capital.

As *The Wall Street Journal* expressed it, utility executives "squirmed in indignation." C. W. Kellogg, head of the EEI, commented that Chairman Eicher could hardly expect his listeners to agree with everything he had said. The *Journal* editorially reminded Chairman Eicher of the quasi judicial character of his commission, and suggested that SEC officials either "forswear public platforms altogether and confine their outgivings within the limits imposed by their official duties or else to eschew all remarks that could be deemed out of place by a judge on the bench."

Chairman Eicher intimated that investors were being unduly alarmed regarding the value of their securities, whereas "studies of independent statistical agencies indicate that the break-up value of many holding companies is substantially greater than their present going value." This probably refers to

the study issued by Standard Statistics in March, favorably mentioned by former SEC Chairman Frank. Standard recently issued new estimates (see accompanying table) which in most cases were lower than the old. In the case of some senior securities, the revised estimates, with 20 per cent allowance for shrinkage, were lower than current market prices.

STANDARD & POOR's index of 17 holding companies' stocks has declined about 25 per cent in 1941, compared with a net dip of 14 per cent in operating company stocks and 6 per cent in industrial issues. The accompanying chart shows holding company stocks back to the level of 1918-21, while operating utilities and industrials are substantially higher. Why do holding company stocks continue to decline when their potential liquidating values have been so well advertised? (The FORTNIGHTLY, as indicated on page 32, began analyzing liquidating values over a year ago.)

So far as the writer is aware, utility executives have never made a practice of questioning these estimates. But after all they remain estimates, since there have only been a few cases of public offerings of operating company securities by holding companies. Standard & Poor's has pointed out recently a great deal of potential shrinkage must be allowed under war conditions, with resulting severe leverage effects on junior securities. Thus, while United Light & Power preferred was given a liquidating value of 71 by Standard in March, more recently the estimate was scaled down to 47, and after allowance for "shrinkage" to 2, compared with the cur-

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rent market price of 24. Northern States Power Class A, formerly valued at 21, was reduced to 10, while 20 per cent shrinkage would leave nothing at all for shareholders, according to Standard's new estimates. While these are extreme instances it is only natural that holding company stockholders remain somewhat skeptical, especially as the current downward trend of earnings will be magnified by the leverage factor, and it is impossible in most cases to "time" the eventual distribution of assets.

Chairman Eicher has intimated that a year or two will be allowed for integration. If holding company stockholders have to wait that long, the shrinkage in their securities *may*, due to war, prove bigger than those estimated by Standard. Moreover, this does not take into account delays due to possible litigation over SEC powers.

BUT the fears of declining earnings and integration delays are perhaps not the major factors in the recent decline in holding company stock prices. The SEC itself may have some responsibility because of proposed or rumored rulings which might have a very drastic effect on the income of holding companies and the value of their securities.

Some holding company systems are regarded as vulnerable to threatened SEC action to jack up depreciation rates. Some of them would doubtless be affected by a rumored dividend embargo designed to reduce operating company debt to 50 per cent of net property. Others, such as Electric Bond and Share, would be severely handicapped by the cutting off of interest income from subsidiaries with preferred stock arrears. Still others, such as North American Company, are interrupted in the carrying out of dissolution proceedings and threatened with application of the Deep Rock Oil precedent, which subordinates holding company investments to similar securities held by the public. In view of these constant fears that holding companies will be torpedoed by one means or another, many investors in holding company stocks naturally desire to "cash in" now. Under such circumstances, theoretical estimates of higher values obtainable—subject to the good graces of the SEC—two or three years hence may not prove effective assurance.

It seemed evident from Chairman Eicher's remarks that the commission leans toward the method of a voluntary exchange of operating company securities for holding company issues, rather

ESTIMATED LIQUIDATING VALUES

	Issue	Page	Fortnightly 1940 Estimate	Standard & Poor's Good-	Approx
			Amount	New Est. Less 20% body	Price
Amer. Gas & Elec. Common	12/5	805	\$30	\$35	\$27
Amer. P. & L. \$5 Pfd.	3/14	356	58	70	58
Amer. Water Works \$6 Pfd.	—	—	—	205	185
Common	—	—	—	9	7
Columbia G. & E. \$6 Pfd. ..	—	—	—	137	130
2nd Pref.	—	—	—	122*	115*
Common	—	—	—	2	1½
Commonwealth & Sou. Pfd.	1/2/41	37	117	130	105
Common	—	—	—	—	—
Elec. Bond & Share \$5 Pfd.	3/28	416	152	121	111
Common	—	—	14	6	3
Electric P. & L. \$6 Pfd.	4/11	482	78	41	28
Engineers Pub. Ser. \$5 Pfd.	5/9	609	152	146	120
Common	—	—	12	10	4½
Middle West Corp. Common	—	—	—	14	12
National P. & L. Common	6/20	803	11	9½	6½
North American Co. Common	6/6	742	25	21	17
Nor. States Power Class A	—	—	—	10	0
Standard G. & E. \$6 Pfd. ..	4/25	550	52	29	13
United Gas Impr. Common	9/13	354	11	14	11
United L. & P. \$6 Pfd.	3/28	419	36	47	2

*Over-all basis.

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FINANCIAL NEWS AND COMMENT

han liquidation and eventual cash distribution, thus avoiding the troublesome tax problem and the price shrinkage involved in public offerings. This is an excellent idea. But the only important instance of this method, exchange of San Diego stock for Standard Gas bonds, has not been proven entirely successful and there is almost always a minority who will refuse such a voluntary exchange in hopes of realizing higher cash values.

Regarding Chairman Eicher's opinion that the industry is "holding back" on integration, it may be remarked (1) that the large systems, with possibly two or three exceptions, have in the past year committed themselves to a general program of coöperation with the SEC—though many minor issues remain, of course; and (2) that the one system which is definitely prepared to take § 11 to the courts—Engineers Public Service—has apparently been unable, thus far, to get started on that test.

Canadian Power Companies Feel War Taxes

SINCE Canada is "one jump ahead" of the United States as regards participation in the European war, it may be of interest to see what has happened to some of the larger utilities in that country in the past year or so.

The current proposal to increase the minimum corporation tax in Canada from 30 to 40 per cent will naturally have a more adverse effect on utility earnings than the pending jump from 24 to 30 per cent here.

Montreal Light Heat & Power, probably the largest Canadian company (assets about \$210,000,000), in 1940 reported earnings of \$1.60 compared with \$1.83 in 1939 and \$1.77 in 1938. Gross revenues gained only 6 per cent, expenses were 5 per cent larger, and depreciation 8 per cent; but taxes jumped 66 per cent, and as a result earnings dropped 13 per cent. Had taxes increased only as fast as revenues, share earnings would have been \$2.02 instead

of \$1.60—a gain of 11 per cent over 1939.

The company's stock is currently selling on the Curb around 14½ to yield about 9 per cent, after allowance for Canadian exchange. It is down about 44 per cent from last year's high and 20 per cent from the 1941 high—a record almost identical with that of Consolidated Edison.

Shawinigan Water & Power, one of the largest hydro companies in the world, was able to make a somewhat better showing, possibly because of smaller Dominion taxes. While taxes gained 63 per cent they absorbed only 14 per cent of gross, compared with 22 per cent for the Montreal Company. Expenses and depreciation increased but slightly and share earnings dropped only 4 per cent, to 95 cents. The stock is currently around 8½ on the Curb, down 54 per cent from last year's high and 23 per cent from the 1941 high. The annual dividend rate of 90 cents indicates a net yield of about 10½ per cent.

MONTREAL Light Heat & Power's interim earnings have not been published but Shawinigan made an excellent showing in the first quarter of 1941, reporting 46 cents compared with 30 cents in the first quarter of last year. These figures, however, were before income and excess profit taxes, and after a rough adjustment to present rates this year's earnings will be cut to around 32 cents, still a slight gain over last year (although anticipated higher taxes would probably change this to a decrease). The gain in revenues was about 18 per cent over 1940. Obviously, the company was able to control its expenses better than the Montreal Company, to which it furnishes hydro power, possibly because it distributes more current at wholesale.

Gatineau Power Company in 1940 earned 82 cents compared with \$1.04 in the previous year; revenues gained only about 4 per cent; hence the company was hurt by taxes which jumped nearly 100 per cent. Owing to this leverage effect of taxes, it is estimated that a rise in the

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normal tax rate to 40 per cent this year might cut earnings to around 60 cents (interim figures are not yet available).

Gatineau Power stock is owned by International Hydro-Electric, which is now largely dependent on Gatineau dividends to pay the interest on its own bonds. Owing to current doubts regarding the safety of Gatineau dividends, the Hydro bonds recently slumped to 36½ compared with last year's peak of 74½ and this year's high of 51½. At current prices the bonds would seem to have discounted immediate difficulties, as the next coupon is not due until October. Recent stiffening of Canadian dollar exchange, and the possibility of further gains due to defense collaboration with the United States, may partially offset a further rise in Canadian taxes.

\$234,000,000 Telephone Financing Ahead

AMERICAN Telephone and Telegraph is planning the largest single financial operation in its history. Stockholders were to be asked on June 25th to approve an offering of \$234,000,000 convertible debentures, most of the money to be used for an expansion program to meet defense needs. Bell system long-distance traffic is running about 30 per cent over last year, and new telephones are being added at a record rate, requiring a \$400,000,000 construction program this year. No plans have been specifically announced for retiring the \$95,000,000 5½ per cent debentures next fall, though it is possible that part of the proceeds of the convertible issue may be used.

At the meeting on June 25th the interest rate on the new bonds, the maturity, and the terms of conversion were to be announced. The conversion price, not yet determined, would probably not exceed 150 compared with the current price of the stock around 153. The interest rate would be between 2 and 3 per cent, the redemption price not over 107, and the maturity between 1949 and 1956. Subscription rights would be offered to stockholders on the basis of \$100 bonds

for each of the 8 shares of stock held.

The company's last financing was in December when \$140,000,000 new money was raised through private sale of bonds.

More Billions for Federal Power?

THE question of the adequacy of our electric power resources, raised from time to time by Washington, has again come to the fore owing to the accelerating tempo of the defense program, plus severe drought difficulties in TVA territory. Last year the industry, by marshaling the factual evidence, demonstrated its ability to meet all reasonable demands. A Federal "grid" in eastern territory to be superimposed on the existing private power pool (already interconnected except at a few points) was shown to be a waste of public funds similar to the abandoned Passamaquoddy plan.

The industry has recently stepped up its expansion program and, if there are no unforeseen delays in obtaining deliveries of generators and other equipment, it should be prepared to handle all over-all discernible demands although some local difficulties may crop up from time to time. President Kellogg of the Edison Electric Institute, speaking at the convention recently, expressed confidence that there would be an adequate supply of power not only to "turn the wheels of industry but also to supply the needs of the great electrochemical and electrometallurgical industries." He stated that some recent alleged power shortages, when analyzed, proved to be merely an unwillingness to pay the necessary price to obtain an added power supply, which in physical amounts was entirely available. (It is obvious that if stand-by steam plants must be pressed into service, costs are going to be higher.) As to the general shortages estimated by the FPC or other government agencies, Mr. Kellogg stated that these needs, following early forecast, have usually been anticipated by construction before they occurred.

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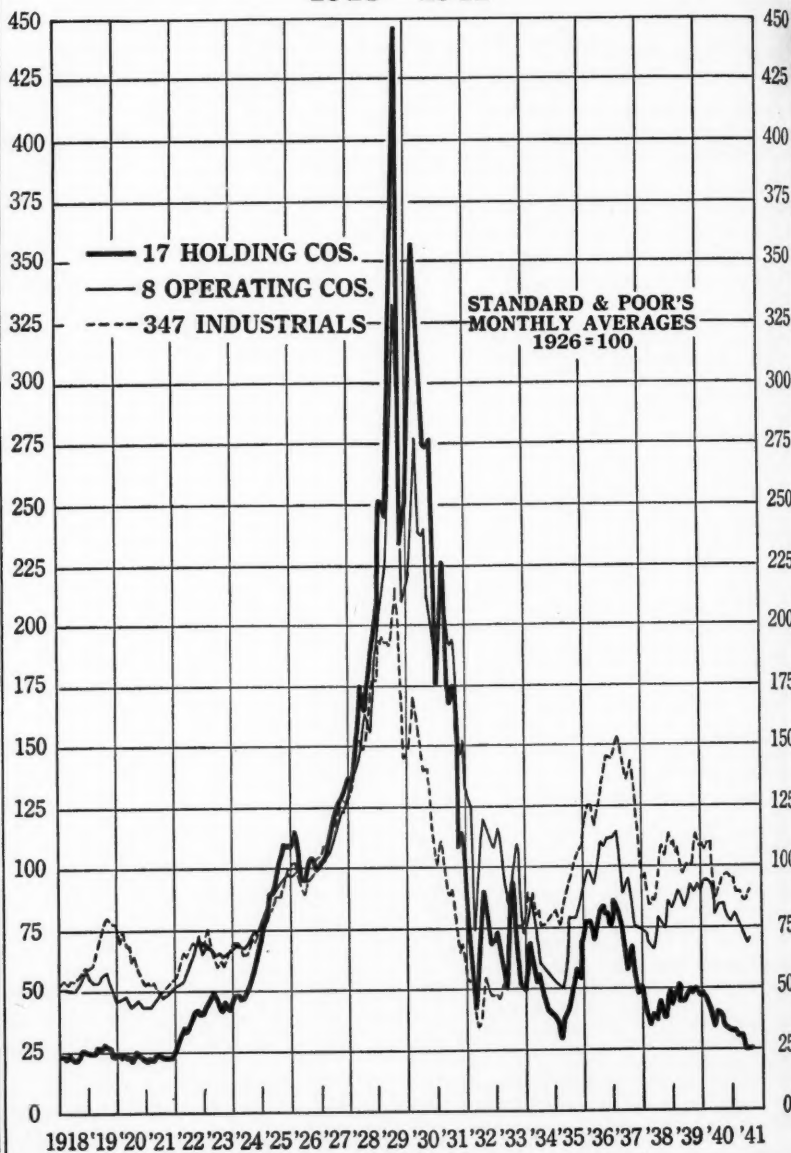
FINANCIAL NEWS AND COMMENT

INTERIM EARNINGS PER SHARE

Electric and Gas Companies	End of Periods	12-month Period			3-month Period		
		1941	1940	Incr.	1941	1940	Incr.
American Gas & Elec. Consol.	Apr.	\$2.87	\$2.84	1%	\$.23b	\$.28b	D18%
Amer. Power & Lt. (Pfd.) Consol. ...	Apr.	6.38	6.83	D7	1.82	2.04	D11
American Water Works Consol.	Mar.	1.11	1.17	D5	.28	.33	D15
Parent Co. ..	Mar.	.32	.54	D41	.00	.10	..
Boston Edison	Mar.	2.40	2.22	8	.89	.88	1
Cities Service P. & L. (Pfd.) Consol. ..	Dec.	33.19	35.93	D7	10.15b	10.49b	D3
Parent Co. ..	Dec.	27.41	19.90	38	..	..	..
Commonwealth Edison Consol.	Mar.	2.31	2.29	1	.73	.75	D2
Com. & Southern (Pfd.) Consol.	Apr.	9.22	9.13	1	3.30b	2.92b	13
Consolidated Edison, N. Y. Consol.	Mar.	2.11	2.25	D7	.99	1.11	D11
Parent Co. ..	Mar.	2.06	2.14	D4	.75	.77	D2
Cons. Gas of Baltimore Consol.	Mar.	4.25	5.06	D16	1.25	1.41	D11
Detroit Edison Consol.	Apr.	1.76	1.58	12	..	..	..
Elec. Bond & Share (Pfd.) Parent Co. ..	Mar.	7.18	6.78	6	1.86	1.54	20
Elec. Power & Lt. (1st Pfd.) Consol. ..	Nov.	8.42	5.63	50	.84	1.33	D37
Parent Co. ..	Nov.	1.75	.71	147	.41	.31	32
Engineers Public Service Consol.	Apr.	1.66	1.72	D4	.56b	.61b	D8
Parent Co. ..	Apr.	.55	.60	D8	..	..	..
Federal Light & Traction Consol.	Mar.	1.85	2.66	D31	.67	.84	D20
Inter. Hydro-Elec. (Pfd.) Consol.	Mar.	2.62	5.35	D51	2.23	.58	285
Long Island Lighting (Pfd.) Consol. ..	Mar.	5.86	5.34	9	1.65	1.02	61
Parent Co. ..	Mar.	6.79	5.46	24	1.87	1.28	46
Middle West Corp. Consol.	Dec.	1.20	1.24	D3	.34b	.26b	31
Parent Co. ..	Dec.(a)	.53	.43	23	.09b	.11b	D18
National Power & Light Consol.	Feb.	1.34	1.15	16	.38	.43	D11
Parent Co.	Feb.	.65	.59	10	.19	.20	D5
Niagara Hudson Power Consol.	Mar.	.73	.47	56	.26	.19	36
North American Co. Consol.	Mar.	2.00	2.00	..	.58	.51	14
Parent Co.	Dec.	1.52	1.60	D5	..	..	..
Nor. States Pwr. (Del.) Consol. (C.I.A)	Feb.	3.28	2.33	40	..	..	..
Pacific Gas & Electric Consol.	Mar.	2.54	2.89	D12	..	..	..
Public Service Corp. of N. J. Consol. ..	Apr.	2.50	2.85	D12	..	..	..
Parent Co.	Dec.	2.44	2.60	D6	..	..	..
Southern California Edison	Mar.	2.27	2.40	D6	.48	.44	9
Stand. Gas & Elec. (Pr. Pfd.) Consol. ..	Dec.	9.79	6.94	40	..	..	..
Parent Co.	Dec.	2.11	1.76	20	..	..	..
United Gas Improvement Consol.	Mar.	1.06	1.05	1	.29	.27	8
Parent Co.	Mar.	.97	.98	..	.23	.24	D4
United Lt. & Power (Pfd.) Consol. ..	Mar.	8.71	8.51	3	..	..	..
Parent Co.	Mar.	3.98	3.47	15	..	..	..
Gas Companies							
American Light & Traction Consol.	Mar.	1.79	1.69	6	..	..	..
Brooklyn Union Gas	Mar.	2.44	2.43	D45	.86	.84	2
Columbia Gas & Electric Consol.	Mar.	.35	.63	D45	.31	.49	D37
Parent Co. ..	Dec.	.38	.34	12	..	..	..
El Paso Natural Gas Consol.	Apr.	3.72	3.82	D3	1.17b	.89b	32
Lone Star Gas Consol.	Mar.	1.14	1.27	D10	.80	.83	D4
Oklahoma Natural Gas	Apr.	3.57	3.40	5	..	..	..
Pacific Lighting Consol.	Mar.	3.32	2.85	16	..	..	..
Peoples Gas Light & Coke Consol.	Mar.	5.05	4.58	10	2.52	2.10	20
United Gas Corp. (1st Pfd.) Consol. ..	Dec.	12.27	11.18	10	..	..	..
Parent Co.	Dec.	9.20	8.05	14	..	..	..
Telephone and Telegraph Companies							
American Tel. & Tel. Consol.	Feb.	11.55	10.61	8	..	..	..
Parent Co.	Mar.	10.20	9.58	6	2.60	2.47	5
General Telephone Consol.	Mar.	2.93	2.38	23	.83	.59	40
Western Union Tel.	Mar.	4.49	2.30	95	1.23	.20	515
Systems outside United States							
Amer. & For. Pwr. (1st Pfd.) Consol. ..	Dec.	6.17	5.39	14	..	..	..
Parent Co.	Dec.	3.13	2.72	15	..	..	..
Inter. Tel. & Tel. Consol.	Dec.(a)	D.03	.45	..	..	..	..
Parent Co.	Dec.	D.29	.24	..	..	..	..

D—Deficit or decrease. (a) Earnings are exclusive of certain subsidiaries. (b) January-March quarter.

UTILITY VS. INDUSTRIAL STOCK AVERAGES 1918 - 1941





What Others Think

Holding Companies and the National Defense



CHAIRMAN Edward C. Eicher of the Securities and Exchange Commission, at the recent annual convention of the Edison Electric Institute at Buffalo, New York, served notice that the SEC intends to enforce § 11 of the Holding Company Act. At the same time he gave assurances to utility investors that holding companies will not be broken up by sudden or punitive persecutions under the act. The chairman pledged his commission to enforce the act carefully, as well as thoroughly, keeping in mind the best interests of the investors as well as the consumers.

Prior to Chairman Eicher's address, some hope had been fostered in holding company circles that the SEC might be disposed to suspend active or complete enforcement of the integration provisions of the act "for the duration" of the present emergency. This hope for a "holiday" or "reprieve" on the enforcement of § 11 was based upon the burdensome situation in which the industry now finds itself trying to take care of the unprecedented demand for service created by general defense activity and drought complications. The suggestion had been made that holding company management should not be interrupted or distracted at this time from operation problems by matters of corporate reorganization which could just as well wait for more favorable circumstances.

HOWEVER, Chairman Eicher took the position that cleaning up the holding company structure in compliance with the act will be a help rather than a hindrance to effective industrial operations in the national defense. "If there was ever a time," he said, "when it is of the utmost importance to clear away the debris of holding company siphoning-off

of assets and earnings, now is that time." Furthermore, he implied that much of the apprehension over the consequences of enforcing § 11 had been artificially fomented. He stated:

The executives of some of your larger holding company systems have recently been before us in Washington with a plea which, in homely language, runs something like this: "Our stockholders are scared to death! They believe that the enforcement of § 11 will wipe out their values! The prices of our securities are sinking out of sight! Please do something to help us!" It is true that the stockholders in many holding companies have been badly frightened. But that fear has been nurtured by a systematic campaign of fear conducted by some of the very executives who are now pleading for help. It is not necessary to name names. It is only necessary to refer to the periodic official announcements of several holding company managements to their security holders—the statements in the annual reports and at the annual stockholders' meetings. Those statements speak for themselves. They have been calculated to generate the fear that the enforcement of § 11 would result in the distress sale of assets within a brief and completely unelastic period of time. And if we read the signs properly, those who created this monster of fear are now themselves frightened by the results that they have produced.

CHAIRMAN Eicher made his informal declaration of policy with respect to enforcing § 11 in five points, or "truths," which might be briefly summarized as follows:

1. The commission is resolved to enforce § 11.
2. The law does not require the sale of holding company assets at unfair or inequitable prices; hence the SEC will see to it that security holders are protected against sales on such terms.
3. Orders under § 11 are not self-enforcing and do not come within the criminal sanctions of the statute;

PUBLIC UTILITIES FORTNIGHTLY

hence the commission may use its discretion in allowing time for carrying out orders, even though that time may extend beyond the second optional year if special circumstances warrant such consideration. Otherwise, the commission will apply to a court to enforce compliance (although it was noted that the SEC is not required to apply to the court at any particular time).

4. Studies of independent statistical agencies indicate that the "break-up" value of many holding companies is substantially greater than their present "going value." Hence the sale of holding company assets will not necessarily be a "losing proposition."

5. There will be no necessity for the sale of underlying securities in the general market; and holding companies may meet the requirements of the statute by distributing underlying securities directly to security holders on a pro rata basis.

CHAIRMAN Eicher rejected the argument that national interests could be best served by deferring holding company reorganization. He stated on this point:

Not until after the World War did large parts of the policies come under the domination of financial interests or financially minded operating men. In the last World War, the problems of the increased needs of power were solved primarily by true operating men whose interest was in production for service. Today, the problem is complicated by the fact that the front line operating men — those who really know the down-to-the-earth defense power needs of their own communities — are powerless to make decisions. The decisions must come from distant holding company executives who at best are only remotely familiar with particular power problems and who at worst are selfishly refusing to do anything which they fear might weaken their own stranglehold on a scattered system.

All of these facts point to a joint obligation resting on the public utility industry and the government, including the Securities and Exchange Commission. The public utility industry must plan, more carefully than it ever has done before, to create additional capacity for the critical years ahead of us, and it must plan now. It must plan

comprehensively in terms of projected production—liberally estimated—and in terms of financing conservatively the facilities that are necessary for such stepped-up production. It must plan to build and locate additional utility facilities so that they will be coordinated and integrated with existing utility facilities as far as possible in a manner that will afford maximum use of all our generating capacity and will produce the maximum of energy therefrom. It must plan to coordinate and integrate to the fullest extent possible all existing utility facilities so that munitions of all kinds can flow uninterruptedly from our factories. It must plan to produce and distribute power at the lowest possible cost without unnecessary overhead and service charges so that our national defense bill will not be unduly increased. To facilitate its financing and to encourage public acceptance of its securities, the industry must simplify its corporate structure.

The speaker observed that the electric industry has a greater responsibility today than in World War I. During the period 1914-1918 American industry was only 40 per cent electrified and less than half of that was supplied by utility companies. Today American industry is 90 per cent electrified and nearly 65 per cent is utility service. The SEC is studying particularly those companies operating in the defense material areas in the light of the impact of national policies on their dollar needs. Additional facilities must be tied in with future financing plans.

IN closing the convention, C. W. Kellogg, president of the Edison Electric Institute, gave assurances to Mr. Eicher that both holding and operating companies would use their best efforts to see to it that the power supply of this country is adequate at all times.

The deferment of every kind of governmental expenditure that does not go directly into the war was urged before the institute by Carl Snyder, former statistician of the Federal Reserve Bank of New York, as a means to prevent disastrous inflation. Mr. Snyder warned that the country cannot continue at the usual rate of expenditure and improvement merely by printing money, which is virtually what it is doing now. Business as usual is impossible, he said.

"We are spending billions by printing

WHAT OTHERS THINK



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THE CAT IS BACK

money in the form of bonds, which can only lead to a disastrous inflation unless we can curtail expenditures correspondingly in other ways," he asserted. It is a vast delusion, Mr. Snyder told the convention, that this country can somehow continue its present colossal scale of

government expenditure, and, by means of huge issues of bonds and by heavy taxation largely falling upon the rich, come out the gainer in the end. "The rich cannot pay for this war, alone," he added, declaring there has been a continuation of all the worst features of the

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past ten years in "an insane belief, as I view it, that we can somehow 'spend our way to prosperity.'"

Colonel H. S. Bennion, vice president and managing director of the Edison Electric Institute, advocated that the nation's private utilities follow a 4-point program to insure an adequate power supply for whatever expansion in the defense program may come. He suggested rearrangement of the industrial demand for power over different hours of the day wherever possible and recommended restudies of generating plant, transmission, and distribution facilities to determine what each part of the system can be forced to do if necessary to get the most out of the plant.

As a third point, the speaker urged that all companies keep well posted on load and capacity conditions in all neighboring territories. As a fourth point he called for the reexamination of the types of customers being supplied with electricity to determine which ones could be curtailed if a real need should arise in the future.

J. E. MOORE, operating consultant of Ebasco Services Incorporated, said that today a new emphasis and in some respects a new significance attach to the benefits realizable from power system interconnections. In particular, he added, the impact of the defense program upon electric power systems was just beginning to be appreciated, for the reason that the defense program itself was just beginning to be understood.

Mr. Moore in his address continued:

For operation in 1942 no new generating units of economic size, other than those now in process of construction, can be made available. For operation in 1943 the situation as to manufacturers' facilities and floor space and as to critical materials and skilled labor definitely limits the aggregate capacity of new generating units which can be produced.

This limit aggregate of new units must be divided between utility system plants, large industrial plants, and government plants. Priorities may affect unexpectedly the destination as to specific localities of the generating units which can be produced for 1942 and for 1943. However, both for 1942 and for 1943 an amount of effective load-carrying capacity can be made available by suitable interconnections which will constitute a far larger addition to our power resources than is generally recognized.

If during a war emergency the United States can reach a \$110,000,000,000 national output, estimated for 1943, it can do it for peace, but it will have to work almost as many hours, D. C. Prince, manager of the commercial engineering department of the General Electric Company, declared.

Analyzing the division of national income and output in 1940, a comparatively normal year, and that which will exist in 1943, when the defense program will be in full swing, Mr. Prince suggested that by 1942 "we shall have a total national output of \$110,000,000,000 which will flow from the work of 55,000,000 people working forty-six hours a week," compared with the national output of \$82,200,000,000 in 1940, of which only about \$2,700,000,000 was spent directly on national defense.

Competitive Bidding and the Redistribution of Voting Power

CONTINUING its series of "comment" articles on various provisions of the Holding Company Act, *The Yale Law Journal*, in its April and May issues, respectively, takes up the subject of "competitive bidding" and "distribution of voting power." The article on competitive bidding in the April issue is

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the product of J. K. Busby. The article on the distribution of voting power in the May issue is unsigned.

Mr. Busby thinks that adequate analysis of the problem underlying the competitive bidding controversy is still needed, despite "extensive and bitter dispute." He agrees completely with the

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position taken by the Securities and Exchange Commission in its recent regulation under the Holding Company Act that "underwriters' fees (where bonds have been privately handled) are excessive, that they stem from the existence of more or less informal monopolistic practices among investment bankers, so far untouched by the regulating techniques of the commission, and that the effects of these practices can be successfully curtailed only by a system of competitive bidding."

The author outlines the traditional technique of syndicate underwriting through private negotiation. He says "there is little risk in underwriting a utility bond issue" because the bond will almost surely find a ready market. Under such circumstances, excessive payments for the "risk" of handling an issue can hardly be justified. Likewise, large payments to dealers for service rendered in selling the bonds are objectionable.

THE reasons why these practices have flourished in the past, according to Mr. Busby, are: (1) domination of corporate financing by investment bankers who do not compete for but, instead, share available underwriting business; (2) utility management has not always attempted to sell securities on a competitive basis but has submitted to the influence of noncompetitive financial interests; (3) the inability of the SEC and other regulatory authorities to correct abuses of closed financing by regulation of it as such, because of the absence of a proper standard for a reasonable fee, and the failure of restrictive rules (such as the former Rule U-12F-2) to abate collusive underwriting. The author concludes that a definite requirement of open competitive bidding is the only complete remedy. He adds:

Competitive bidding, however, has not been without its critics, who argue that it will injure investors and issuers as well as underwriters and dealers. It is argued that by eliminating the regular banker who may insist that protective provisions be inserted in indentures, investors will suffer. But a major cause for creation of the SEC's pow-

ers under the Trust Indenture and Holding Company acts was the failure of bankers to protect the interest of the investing public; and these critics have not suggested the SEC will not provide the necessary safeguards. Likewise, the contention that competitive bidding will cause losses to purchasers by forcing security prices to levels unsustainable after the public offering, is of dubious validity. The argument implies that it is *not* in the public interest for utilities to sell their securities on the best terms obtainable—the antithesis of the premise supporting regulation of utility finance. Furthermore, overpricing is likely to be curtailed by so-called buyers' strikes, and in any case the supposed injury to individual investors is largely imaginary: The buyers of utility bonds are mainly institutional investors purchasing for yield to maturity without regard for short-term price fluctuations. Nor is it likely that issuers will be injured by losing the advice of a regular banker or his assistance in preparing registration statements and indentures. Utility management is able to formulate its own financial policy, and, although an independent adviser can be employed if necessary, setting up registration statements and indentures is no longer difficult.

Mr. Busby observes that the experience of Massachusetts and New Hampshire, where competitive bidding has been required for some time on the handling of utility underwriting, indicates that competition need not interfere with an issuer's time schedule or penalize underwriters by lengthening the commitment period. Further, he points to the willingness of certain bond houses to submit competitive bids as a suitable safeguard against any concerted sabotage of the competitive bidding rule by the refusal of banking interests to submit bids.

IN discussing the distribution of voting power under the Holding Company Act, the May issue of *The Yale Law Journal* observes that § 11 (b) (2) merely requires the SEC (1) to simplify corporate structures through the elimination of pyramids; (2) to avoid more than one class of voting stock within the same corporate structure; and (3) not to permit the exercise of control through "disproportionately small investment."

This, the article submits, is a rather meager guide for the SEC in the estab-

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lishment of a policy for fair and equitable distribution of voting power. Under § 7 (e) companies are forbidden to "alter the priorities, preferences, voting power, or other rights of the holders of an outstanding security" if the commission finds that the change will "result in an unfair or inequitable distribution of voting power." But no specific statutory standard is provided thereunder.

The article goes on to cite cases in which the SEC has interpreted these powers—rather sparingly, in the opinion of the author. Thus corporations have been permitted voluntarily to enfranchise previously voteless preferred stockholders. Over the voting rights of recent issues, the commission has maintained vigilant supervision. The act imposes a "heavy presumption" against the issuance of any but common stock having at least equal voting rights with any outstanding security. More recently, the terms and conditions of new preferred issues, although not providing for shifts of control in the election of directors (except for dividend defaults), have assumed a consistent pattern in affording purchasers more voting protection.

Usually, new preferred holders, voting as a class, must approve mergers. Prejudicial charter amendments must have the consent of two-thirds of the preferred class, as is usually the case for dividend payments on outstanding junior shares or subsequent issues of preferred stock or debt securities. Preferred shareholders have won increased recognition in corporate elections through permanent voting rights share for share with the common stock in some cases. After defaults aggregating one year's dividends, they may vote as a class for two directors, and, after 12 quarterly dividends, for the majority of the board.

HOWEVER, *The Yale Law Journal* article states that "the variations, usually involving earlier shifts of control, have been slight." While policing voting rights under other sections of the act, the commission has made few direct references to the fair and equitable distribution required under § 11 (b) (2).

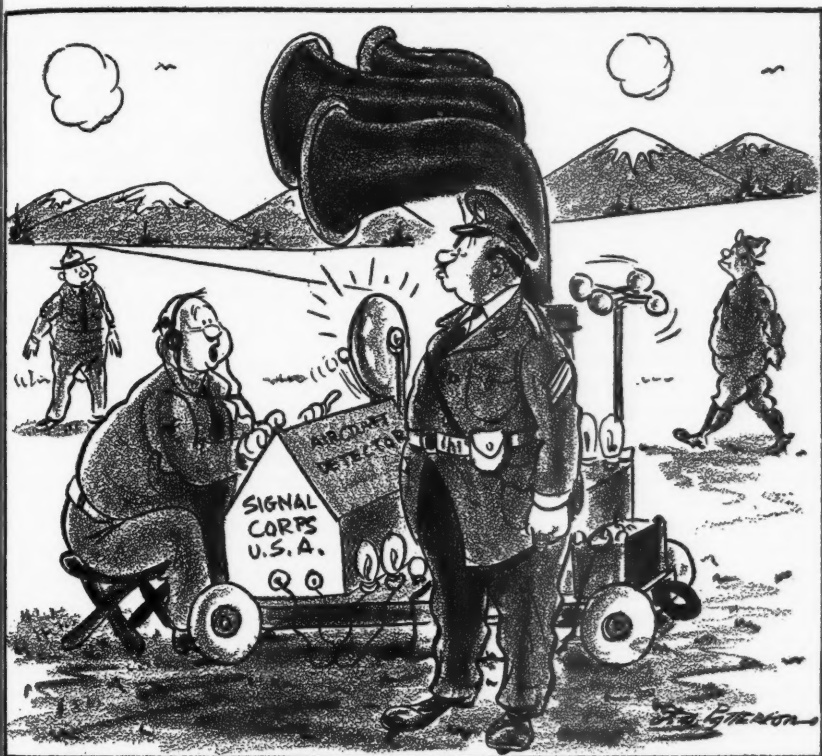
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It has directed its enforcement program under this section chiefly at corporations where valueless common stock constitutes only a small percentage of capital stock liability. The commission has thus geared its active administration of § 11 (b) (2) to the reorganization of structurally deficient corporations.

However, in the recent *Columbia Gas & Electric Corporation Case* (where the company sought to withhold voting by preferred shareholders for directors except where four dividends might be in default, and then only on a share-for-share basis with the more numerous common), the commission ignored the claim that dividend records were good and the contention that enfranchising preferred holders would impair the rights of common stockholders. In short, it refused to find the distribution fair and equitable. The article states:

Despite such vague threats of progressive action and the increasingly high standard that the commission is requiring of preferred stock voting provisions, its powers are being frugally employed. If effective protection and participation are to be achieved, a more decisive therapeutic is needed. Preferred stock, voting as a class, should have permanent minority representation, not so large as to block action, but assuring consideration of senior interests. On stated contingencies the representation should be increased to achieve the commission's standard of recognition in proportion to investment. The traditional contingency—accumulation of dividend arrearages—is appropriate for this formula. Its exclusive use, moreover, has been approved in recent Federal legislation. The Investment Company Act of 1940 requires provision for preferred stockholders to elect a majority of directors when dividends are unpaid for two years. Chapter X of the Bankruptcy Act, demanding fair and equitable distribution of voting power within a reorganized company, specifies for preferred stock that the charter include provisions for the election of representative directors in the event of dividend defaults. But to insure a shift of control before damage becomes irreparable, other contingencies such as the failure of earnings or assets to maintain stated levels, should be considered for inclusion. Complemented by class voting rights in proposed action materially affecting their interests, this permanent participation by preferred stockholders would help to break down their indifference and to prevent repetition of the abuses to which they have been subjected.

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"THAT EX-TELEPHONE SOLDIER MADE THEM SO DARN SENSITIVE THE ALARM GOES OFF FOR BUMBLE BEES"

THE article concedes that the potential impairment of common stock rights through the development of class representation in corporate directorates must receive consideration. The shift of control must be timed so as to give common stockholders a chance to achieve successful management. Further, they must be protected after control has passed and their own control must be reinstated after arrearages have been eliminated.

The fiduciary duties of directors must be adjusted to new legal relations, since conflicts between allegiance to constituents and duty to the corporation as a whole might damage the property through ineffective management. Courts,

the article states, must hold the director as a fiduciary for all stockholders. Finally, the success of a program for redistributing voting power was said to depend on adequate procedure for the nomination and election of directors. A divorce of "proxy machinery" from vested management is suggested to arouse American investors.

The SEC, under the powers derived from the Holding Company Act, can test the potentialities of permanent representation for all security holders. If the experiment fails to give adequate protection, it would indicate that existing forms of holding company participation might well be abandoned in favor of quasi public protective committees.

Nature Study Develops an Interesting Gas Leak Survey Technique

IF an experienced doctor were invited to step into a medium-sized auditorium to estimate the health status of an average collection of citizens there assembled, there are certain diseases which he could fairly easily detect in the incipient stage. He could spot certain gland disturbances from pop eyes and obesity. Pale and emaciated faces suggest anemia, possibly tuberculosis.

It would take a little time and, on the basis of such a perfunctory examination, the theoretical "horseback" diagnosis would have to be very tentative. But it is surprising how quickly and effectively the good doctor can separate the healthy from the unhealthy, even after such a casual examination, because he is trained to recognize certain signs which escape the untrained eye. Milton W. Heath, of Wellesley, Massachusetts, has developed a service for locating gas leaks which is very much like that of an examining physician. It is a systematic study of vegetation (trees and grass) near gas lines.

Some years ago, Mr. Heath noted that vegetation has its "normal green," varying at different times of the year and according to the amount of rainfall, the quality of the terrain, and other circumstances. So far, this was not very original. For that matter, gas company operators had long been familiar with the telltale evidences of subterranean gas leaks in the form of drooping vegetation.

BUT Mr. Heath made a specialty of his observations and discovered that after a suitable checking and counter-checking the trained observer of vegetation could (1) determine not only when gas leaks were present as a result of dying vegetation, but (2) when such dying vegetation was *not* the result of gas leakage—and (3) equally important, when very meager and nondescript symptoms, wholly unrecognized by the average person, revealed leakage which could be corrected far in advance of actual damage to vegetation.

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It took a good deal of patience to develop this technique and still more to teach it to others. Mr. Heath found that less than one per cent of men who are already good tree men make good specialty diagnosticians or survey men. Special tools for this work were also developed.

The vegetation expert drives his automobile slowly over streets or along roads where mains are located. When he spots a suspicious appearance he takes tests. If these reveal the presence of gas injury to vegetation, he makes a report on the condition, location, and other circumstances. If no gas injury, reports are also made.

Mr. Heath's organization has been able to render some valuable aid to gas companies, not only by way of detecting leaks, but avoiding damage suits by property owners or establishing the true nature of injury to vegetation where such injury actually exists. Both functions are performed during the same operation. Both artificial and natural gas are harmful to trees and shrubbery, although the poisonous effect is much more pronounced in the case of manufactured gas. In addition to wilting and drying out of hair or feeder roots, trees that have been attacked by gas are also a special target of a certain fungus (nicknamed the "gasbug"). Other symptoms include a jelly-like growth on certain trees, a distortion and unevenness of grass blades, and the drooping of leaves. Small leaks will cause the leaves of a tree to be reduced in size over a period of time. Larger leaks over a shorter period result in discoloration or killing without discoloration of leaves and branches.

ONCE trouble has been discovered to be due to gas leaks, the curative program is fairly simple: (1) The leak is repaired; (2) soil is "aerated"; (3) the tree is fertilized with a curative plant food after a soil test determines the condition; (4) subsoil irrigation is provided through dry wells; (5) decayed branches are pruned.

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Not many years ago, following a severe winter in New England, a number of gas companies received claims for injured trees, shrubs, and lawns due to gas leaks.

Some of the claims were legitimate; many were not. A particularly serious case was that in which a city brought suit for a number of trees, claiming that they had been killed by gas. A thorough

inspection showed some gas injuries and prompt treatment restored 90 per cent of the injured trees to better condition than they were in before. Other injuries were proven not to be caused by gas.

—F. X. W.

ANOTHER CERTIFIED PERFORMANCE—THE VEGETATION METHOD OF LOCATING GAS LEAKS. Paper given before Pacific Coast Gas Association, Coronado, Cal.

Special Rates for Auxiliary and Stand-by Service

ONE of the problems which may become intensified as the defense activity places greater demands on the load capacity of electric utilities, is the customer with a home generating plant. Of course, the customer who takes care of all his own power requirements with his own facilities is only a problem to the utility commercial office in the form of lost sale possibilities. Right now, that is a problem which can be deferred unless the eventual lack of petroleum fuel should suddenly throw such customers on the utility lines without suitable preparation.

But it is the customer who makes only partial use of his own generating facilities and who calls on the utility for auxiliary or stand-by service who creates special difficulties. He may contribute to the peak demand without contributing proportionately to the utility's revenue requirement.

This type of customer was the object of special discussion in a paper recently read before the Nineteenth Annual Conference of State Utility Commission Engineers in Washington, D. C. E. Irvine Rudd, chief engineer of the Connecticut Public Utilities Commission, was the author of the paper. Mr. Rudd stressed the fact that he had no quarrel with the commercial or industrial consumer who sees fit to generate his own electricity, even where he calls on the utility for auxiliary or stand-by service.

If the customer's wiring is segregated so that all the load cannot be thrown on

the utility, the proprietor of such an establishment as an automobile service station can save money by installing a gasoline-driven generator to carry his load when the demand is high. He can use the electric utility service during other hours.

BUT here are some of the questions which a general stand-by customer presents, according to Mr. Rudd:

How shall the electric utility proceed in solving the problem of making a rate for stand-by or auxiliary service to a customer who owns a generating plant? Shall the rate be designed to prevent the use of the utility service as a stand-by or auxiliary? Shall it be so designed as to encourage the private plant owner to discard his plant and turn to the utility for complete service? Shall all the costs be evaluated and the rate be designed to recover these costs without regard to losing or winning the customer?

That is the problem of the utility, but, to my mind, the regulatory problem is to prevent discrimination. Every private generating plant is a competitor of the utility, for its load is removed from the field of utility service. The remaining customers lose because the diversity factor is modified and the volume of kilowatt hours is reduced. If the owner of the private plant is furnished stand-by or auxiliary service there must be no shifting of the costs to the other classes. Discrimination is prevented if the customer is served at not less than his proportionate share of all costs. . . .

So you see, if a customer-owned generating plant starts moving the consumption position of a customer from the high- to the low-consumption brackets, he is heading into the area where billings for service are not recovering all the costs. Therefore, if stand-by or auxiliary service is furnished on the

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complete service rate, the lost operating income will have to be recovered from some other classification or the rate level raised for all the customers in that class. To prevent this discrimination against the other customers, the customer who owns a generating plant should be served on a separate stand-by or auxiliary rate.

Mr. Rudd proposes as a just "premise" that stand-by or auxiliary service should cover the full cost of rendering such service. He added:

I think you will agree that regulation must aim at "the greatest good for the greatest number" of customers. Well! What causatively accounts for a general lowering of prices for electric service? Obviously, increasing volume and longer hours use; that is, higher load factor. If these favorable trends are halted, the lowering of prices must stop. If the stand-by or auxiliary user, a minority of the utility's customers, through favorable conditions, can skim off the top of the utility's sales, thereby reducing volume and lowering load factor, that lost business must affect unfavorably the prices charged by the utility to all other users—unless he pays his way. The stand-by or auxiliary service user must pay enough to cover his full costs of service, including an average return on investment.

IN other words, utility commissions and their staff technicians might be remiss in their duty to the public if they "fail to question sharply any rate for stand-by or auxiliary service which appears to be less than or equal to the rate for complete service." Under such circumstances, the utility should be required to show that its proposed rate is on a higher level than a complete service rate.

Furthermore, stand-by or auxiliary rates should be designed so that the shift of the customer from high consumption to low consumption will result in a higher average rate to those making the shift. The speaker was of the opinion that it is inadvisable to "shade the capacity charges or lower the price for the initial blocks of energy" in making rates for this type of service.

REGULATORY PROBLEM INCIDENTAL TO CUSTOMER-OWNED GENERATING PLANTS. Paper presented by E. Irvine Rudd before the Nineteenth Annual Conference of State Utility Commission Engineers. May 13-15, 1941, Washington, D. C.

Notes on Recent Publications

THE BOOK OF THE STATES: 1941-1942. Published biennially by the Council of State Governments, 1313 East Sixtieth Street, Chicago, Ill. 416 pp. and index. \$3.50.

This is the fourth issue of the unique reference manual on the forty-eight states which is compiled and published biennially by the Council of State Governments. Besides being a "bluebook" of the states in containing routine information on state organization, personnel, dates of legislative sessions, and like material, this volume reports the "news" about the states during the biennium just passed. In addition, one section of the book is a record of the activities of the Council of State Governments as an information center to assist states in performing their functions and in solving problems of legislation and administration. The council was established in its present form in 1935, and now has official commissions on interstate cooperation in forty-four states. These commissions have brought about interstate action in many fields, from flood control to trade barriers.

Much of the material in this book is in tabular form. More than one hundred tables show the occurrence of certain state laws, dates of adoption of major state taxes, as-

sessed valuations of property, qualifications for voting, etc. The "news" in state government appears in concise articles on such subjects as state defense councils; developments in social security legislation and administration; merit system adoptions; state debts and finances; and state advertising. A 15-page bibliography on problems of state government and a roster of state administration officials, classified by function, title, and agency duties, completes the compilation.

COMMISSION JURISDICTION OF COÖPERATIVES. *Garkane Power Co., Inc. v. Public Service Commission (Utah)* 8 *University of Chicago Law Review* 367. February, 1941.

DELEGATION OF POWER—RATE-MAKING BY AGREEMENT OF THE PUBLIC UTILITY WITH THE COMMISSION. *Lenihan v. Tri-State Telephone & Telegraph Co.*, cert. denied, 9 *U. S. Law Week* 3159, 1940. (Minn.) 25 *Minnesota Law Review* 233. January, 1941.

HOLDING COMPANY ACT OF 1935—POWER OF DISTRICT COURT TO APPROVE CORPORATE SIMPLIFICATION PLAN IN NONADVERSARY PROCEEDING. In *Re Community Power & Light Co. (Fed)* 8 *University of Chicago Law Review* 372. February, 1941.

The March of Events

House Votes TVA Fund

A \$40,000,000 appropriation to launch a new \$51,000,000 development by the Tennessee Valley Authority to provide 117,000 additional kilowatts of continuous power needed for production of aluminum for bombers won quick House approval last month. Within thirty minutes after its appropriations committee had presented a resolution to provide for two additional hydroelectric projects and two additional storage dams on the Hiwassee river and its tributaries, the membership gave its consent by voice vote and sent the resolution on to the Senate where speedy acceptance seemed assured.

The brief discussion centered around opposition of some members to TVA policies and the personnel of the board of directors, chiefly the vice chairman, David E. Lilienthal.

The \$51,000,000 development would be in addition to a \$65,800,000 TVA defense program authorized last year. Both are entirely apart from TVA's normal program embracing 10 dams along the Tennessee river.

The additional appropriation was urged by Under Secretary of War Robert P. Patterson, John D. Biggers, director of the Office of Production Management, and President Roosevelt.

FPC Report on Power Requirements

THE Federal Power Commission on June 12th issued the eighth of its reports on "Electric Power Requirements and Supply in the United States," tracing the changes in the demand for power and the capacity available to meet the demand in the 48 power supply areas into which the country has been divided. The new report, which reflects month by month the impact of the expanding defense program on the country's power systems, forecasts the probable demand for electric power in each area through the remainder of 1941 and for the year 1942. It also showed the generating capacity which power systems anticipate they will have available to serve the expanding load.

"In considering the forecasts, however," the report said, "it should be borne in mind that the defense program has been expanded so rapidly that estimates of future load cannot be kept completely up to date," and added that revised estimates indicated an aggregate 1942



load approximately 1,600,000 kilowatts in excess of the figures on which the charts in the report were based.

Ban on RFC Funds Sought

A JOINT congressional committee voted last month to forbid the Reconstruction Finance Corporation to spend money on the St. Lawrence waterway, the Florida ship canal, the Passamaquoddy tidal project, the Tombigbee waterway in the South, and the proposed Nicaraguan canal.

This decision was an agreement worked out by a Senate-House conference committee in a compromise of differences over legislation granting President Roosevelt broad powers to create new corporations for defense projects with RFC funds.

When the Senate first passed this bill it included a restriction limiting funds for any new corporation to \$300,000,000 and expressly providing that the funds not be used for any project rejected by Congress since 1926. The House struck out this section but limited the amount for any new corporation to \$100,000,000 under the theory that none of the projects previously rejected by Congress could be carried for this amount.

The conference committee recently abandoned both plans and specifically banned use of RFC funds for the five projects listed, while limiting any new corporation to \$200,000,000.

In addition to the broad powers for the President, the legislation would increase RFC borrowing power to \$1,500,000,000 and extend the life of its affiliated government corporations to January 22, 1947. The compromise now must be approved by both Senate and House.

SEC Rule Opposed

A PROPOSED new rule by the Securities and Exchange Commission prohibiting the payment of principal or interest of a debt owed by a subsidiary to a public utility holding company if the debtor is in arrears in dividends on its publicly held cumulative preferred stock was opposed on June 10th at an open hearing before the commission by representatives of the Investment Bankers Association and of some of the public utility holding companies that would be affected by it.

James L. Boone, for the Electric Bond and Share Company, argued that the commission

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had absolutely no power to make such a rule, which would make fundamental changes in the relative rights of security holders and raise a serious question of confiscation.

Among those at the hearing were Emmett Connelly, president of the Investment Bankers Association, Nathan Blumberg, counsel for the Ogden Corporation, and George S. Munson, representing holders of preferred shares of the Central States Power & Light Corporation, a subsidiary of Ogden. The Ogden Corporation announced it had previously filed a brief in opposition to the rule.

Mr. Connelly said he thought the rule too broad to get at the abuses at which it was aimed. Instead of an all-over rule he suggested that the commission issue specific orders in specific cases and said he thought the courts were the proper place to settle claims of owners of publicly held stock as against holding company owners.

Roger S. Foster, counsel to the public utilities division of the SEC, said the rule was "essentially procedured" and that it was an attempt to apply the rules of equity in the public utility field in accordance with the Supreme Court's decision in the Deep Rock Case. The commission had ample powers under the Holding Company Act to adopt such a rule, he argued.

Supplying Power Needs

MEETING a pressing demand for national defense power in the Pacific southwest, Boulder dam this year is producing more than five times as much electric energy as was generated in the entire state of California in 1902, Commissioner John C. Page, of the Bureau of Reclamation, on June 17th reported to Secretary of the Interior Harold L. Ickes on the thirty-ninth anniversary of the Bureau of Reclamation.

June 17, 1902, marked the date of the approval by President Theodore Roosevelt of the Federal Reclamation Law under which the Bureau of Reclamation was established thirty-nine years ago. The agency, active in the western third of the country, has become the largest constructor and operator of public power and irrigation projects in the world.

Power from the big Colorado river project completed in 1936, two years before schedule, today is fed largely to plane factories and other defense industries in southern California. This year the output will go well over three billion kilowatt hours, compared with about one-half billion kilowatt hours in 1902.

Commissioner Page called the attention of Secretary Ickes to the significant defense contributions Bureau of Reclamation power and irrigation projects are making to the nation's security in an anniversary report on the bureau's activities. Mr. Page said:

"On its thirty-ninth birthday, the Bureau of Reclamation through Boulder dam, Grand Coulee dam, and other Reclamation projects is

making a substantial contribution to national strength. Power is being provided to plane manufacturers, aluminum reducing plants, and other essential industrial establishments. Power installations at Grand Coulee on the Columbia river are being made to meet an urgent need in the Pacific Northwest. At the same time, Reclamation activities in rural areas, far from industrial centers, are paying the way for post-emergency stabilization."

Pipe-line Truce Reached

BRINGING to an end a controversy which has raged intermittently for nine years, the Columbia Gas & Electric Corporation and the Missouri-Kansas Pipe Line (Mokan) Company on June 12th reached an agreement in their battle for control of the Panhandle Eastern Pipe Line Company.

Under terms of the agreement reached between the Columbia interests and Mokan officials, the Panhandle Eastern Pipe Line Company, which originates in the Panhandle field in Texas and extends its operations into Michigan, will become a free agent in the production, transmission, and sale of natural gas to the numerous cities and towns along its route.

Panhandle Eastern will have a completely new board set-up, consisting of ten independent directors. Two additional directors will be named, one by the Columbia interests and the other by Mokan. A new executive set-up also has been decided upon. It was learned authoritatively that W. G. Maguire, president of Mokan, would become the new chairman of the board of Panhandle Eastern, and James A. Brown, chief gas engineer of the Commonwealth & Southern Corporation, would become the president of Panhandle. Mr. Brown will replace J. D. Creveling.

TVA Accounting

CHAIRMAN May, Democrat of Kentucky, of the House Military Affairs Committee, recently said he would introduce legislation to bring the accounts of the Tennessee Valley Authority under the jurisdiction of the General Accounting Office.

Comptroller General Lindsay C. Warren notified Congress on June 2nd that only action by Congress could settle disputes between the GAO and the TVA over the latter's insistence that it was exempt from accounting office supervision.

May recalled previous congressional efforts to require that the TVA accounts be under GAO supervision.

"I think it is a sound principle of government that all agencies be handled in the same way," May said. "As matters now stand, the TVA people merely requisition the Treasury for whatever money they want and are not accountable to the accounting office."

Holding that Congress did not intend to make the Tennessee Valley Authority ac-

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countable to the General Accounting Office, Attorney General Robert H. Jackson on June 9th made public his opinion with respect to the long-continued TVA controversy.

Immediately rendered to the Secretary of Treasury, the opinion declared that, in making appropriated funds available to the various governmental agencies, the Treasury Department uses both the accountable warrant and the settlement warrant. Only the accountable warrant is used to make funds available to agencies which are subject to the provisions of Title III of the Budget and Accounting Act of 1921, and therefore accountable to the General Accounting Office under provisions of those statutes.

It is significant, the Attorney General pointed out, that under the TVA Act of 1933, as it was originally enacted, the Comptroller General and the General Accounting Office exercised no control over the appropriations and activities of the authority.

TVA to Complete Dam

THE Tennessee Valley Authority coupled an announcement recently that the \$105,000,000 Gilbertsville dam would be completed a year ahead of schedule with another that its facilities for furnishing power to the Aluminum Company of America at Alcoa, Tennessee, would be doubled on June 7th.

The gigantic multipurpose dam on the Tennessee river near Gilbertsville, Kentucky, will be completed in the spring of 1944, the authority announced, without any increase in its original cost estimate and with five generators, instead of the originally planned four, producing 32,000 kilowatts of electricity each.

A 55-mile transmission line from TVA's Hiwassee (North Carolina) dam to the Aluminum Company plant was completed on June 7th, providing facilities for furnishing an additional 170,000 kilowatts of energy.

Completion of the Kentucky dam will open a 650-mile, 9-foot channel from Knoxville to Paducah, Kentucky, and more than double TVA's present flood-control storage capacity, it was said. The dam will form a lake 184 miles long with a storage capacity of 4,500,000 acre-feet of water, and will "provide valuable flood control, especially to portions of the Ohio and Mississippi river valleys," the TVA asserted.

Power Expansion Urged

LELAND Olds, chairman of the Federal Power Commission, on June 5th declared that the electric power companies of the northeastern states, in common with those of other parts of the nation, had been underestimating the power requirements of the expanding national defense program and must be prepared, by the end of 1943, to supply facilities for a "tremendous expansion" of power output.

Mr. Olds, accompanied by Major Thomas

H. Tate, chief of the commission's defense staff, conferred in New York city with 100 representatives of utility companies serving eleven northeastern states and the District of Columbia. Also at the conference were representatives of state utility and power commissions and of the Army and Navy. The states represented included Maine, Massachusetts, New Hampshire, Vermont, Rhode Island, Connecticut, New York, New Jersey, eastern Pennsylvania, Maryland, and Delaware.

The object of the conference, Mr. Olds explained, was to place electric power production throughout the nation on a cooperative basis, with regional expansion stressed, so that the fast-expanding requirements of defense industries for electric power could be met with a minimum of interference with normal power uses.

After the conference Mr. Olds said that a cooperative spirit had been shown by the utility spokesmen. Members of that group had no comment, except for a few who indicated that they had found the meeting "stimulating."

Each of the electric power systems represented presented statements showing its peak kilowatt demands and energy loads, the increase in present loads due to national defense needs, and probable defense loads through 1941, 1942, and 1943. The companies also submitted estimates as to present and future power supply, new interconnections, proposed and suggested emergency measures.

National defense demands for electric power are pyramiding to the extent where government officials now foresee a day ahead when there will have to be curtailment of civilian use.

That opinion was expressed recently by key personnel of the Federal Power Commission concerned with developing plans to assure an adequate supply of power to meet defense program needs for the next two or three years.

Meanwhile, public recognition of the growing demand for electricity was given by the heads of two other major Federal agencies who called for expansion of both public and private generating facilities.

Secretary of Interior Ickes declared at a press conference last month that he had received a request from the Office of Production Management for an additional 1,000,000 kilowatts of energy which would have to be developed by government hydroelectric projects which operate under Mr. Ickes' supervision. These developments include Bonneville, Grand Coulee, Boulder, Shasta, Parker, and other projects, but not the TVA.

At the same time, Securities and Exchange Commission Chairman Edward C. Eicher told the Edison Electric Institute in Buffalo, New York, that the utility industry also must plan to create additional capacity for the unprecedented armament production program. (See pages 31 and 37.)

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Senate Passes on Appointments

THE Senate on June 7th confirmed the nomination of Claude L. Draper of Cheyenne, Wyoming, for a new term as a member of the Federal Power Commission.

The Senate also confirmed the nomination of Ganson Purcell of New York to be a member of the Securities and Exchange Commission.

President Urges Speed on Seaway

PRESIDENT Roosevelt in a special message on June 5th requested of Congress quick legislation to authorize construction of the St. Lawrence seaway and power project under an executive agreement of March 19th with the Canadian government. The President said that the undertaking, which will cost the United States an estimated \$285,000,000, of which New York state is to supply \$92,000,000, was of vital importance to defense.

"I am advised," said the President, "that we can build the St. Lawrence project in four years. Under emergency pressure it may be completed in less time. I should like to agree with the people who say that the country's danger will be over sooner than that. But the course of world events gives no such assurance; and we have no right to take chances with the national safety. I know of no single project of this nature more important to this country's future in peace or war."

The President stressed as major reasons for speeding the project the need for additional electric power for key defense industries in both the United States and Canada; elimination of transportation "bottlenecks" to cut "by more than a thousand miles the stretch of dangerous open water which must be traveled by supplies to Great Britain and strategic North Atlantic bases," and the advisability of transferring "a large portion" of the longer-term naval program to the Great Lakes.

Asserting that production of planes, guns, tanks, and ships was limited by the supply of electric power and transportation facilities, Mr. Roosevelt declared that the enemies of democracy were developing every hydroelectric resource and every waterway "from Norway to the Dardanelles."

There was reported to be strong congressional opposition to the project, some of which was expressed by Representative Jesse Wolcott, Republican of Michigan, who said:

"I think the President has gone pretty far when he claims he can justify the construction of the Great Lakes-St. Lawrence seaway from the standpoint of national defense, and, in the next breath, admits that it cannot be completed for four years."

The request ought to be considered "on its merits," the Representative asserted, and should not be passed "in consequence of any hysteria regarding national defense."

Senator Clark, Democrat of Missouri, said that, in view of the President's assertion that additional electric current was needed for defense industries, he and others of like mind would not object to authorizing development of the power resources.

Clark, who was one of the leaders of the successful 1934 fight to prevent Senate ratification of a treaty approving the proposed undertaking, said, however, he could see no merit in the President's contention that the 1,300-mile waterway from Montreal to the Great Lakes would be of benefit for immediate defense needs.

Senator Adams, Democrat of Colorado, said he could not conceive of a project valuable to defense which would require four years for completion. The seaway, as distinct from the power development, would benefit only one section of the country, he asserted, at the expense of the entire nation and to the detriment of other regions.

On the other hand, Chairman Walsh (Democrat of Massachusetts) of the Senate Naval Affairs Committee, who has opposed the project in the past, said the development would have to be reexamined in the light of the President's message.

Others pointed out that there was no question of the vital need for more sources of power.

The St. Lawrence waterway project on June 11th won the approval of the Office of Production Management "as part of the all-out defense effort." William S. Knudsen, director general of the OPM, announced that the OPM council, composed of Sidney Hillman, associate director general, and Secretaries Knox and Stimson, had approved "both the waterway and electric power phases of the project." Mr. Knudsen's announcement contained only 41 words, but it was apparent that the Roosevelt administration considered these two brief sentences as an important aid in its drive to win congressional approval of the \$300,000,000 project.

The governors of New Jersey and New York on June 12th vetoed a Port of New York Authority resolution opposing construction of the seaway. Acting under state laws empowering veto of actions of Port Authority commissioners, Governor Edison at Trenton said he felt "the same way about this project as does the President; namely, that it will be beneficial to the commerce, trade, and defense of our country." Governor Lehman vetoed the resolution without comment.

The United States must proceed on the theory that the war will last a long time, Secretary Stimson and Adolf A. Berle, Jr., Assistant Secretary of State, told the Rivers and Harbors Committee of the House on June 17th in advocating immediate legislation approving the agreement with Canada for development of the St. Lawrence seaway. The United States, both officials stressed, should prepare for any eventuality.

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Alabama

Industry Asked to Cut Power

THE Alabama Power Company recently disclosed it had asked all industrial consumers to reduce voluntarily their power requirements by 33½ per cent.

In letters calling attention to the drought and impending power shortage throughout the Southeast, the company said the requested

curtailment would prevent the complete withdrawal of its remaining water storage.

Because of the normal slack in power demands between noon Saturday and 6 a. m. Monday, no restriction was placed on power use during that period. It was pointed out that plants which normally close on Sundays could regain a certain amount of lost power by operation on that day.

Arkansas

Ample Power Supply

THERE is electric power available in Arkansas to meet any demand that can be "reasonably" anticipated and large amounts of additional power will be available before any unforeseen demand can require such power, the state utilities commission reported last month.

The commission studied this problem during most of May, through its own engineers and in conferences with the officials of the three large power companies that serve most of Arkansas, its statement said.

The entire western part of the state is "unquestionably" well supplied with power, the statement said. The Southwestern Gas & Electric Company, which serves an area around Fort Smith, stated it had a surplus and was sending power, via the Arkansas Power & Light Company, to the area east of the Mississippi river. The utility is constructing a line to connect with the Public Service Company set-up in Oklahoma and "within five or six months will have a firm surplus of at least 35,000 kilowatts which can be delivered to Arkansas."

The Oklahoma Gas & Electric Company now has a surplus of 10,000 to 15,000 kilowatts and is connecting with the Grand River dam

where approximately 20,000 kilowatts is not yet under control.

TVA Protests Reflection

GOVERNOR Adkins and Arkansas Power & Light Company officials recently declined to engage in a controversy with the Tennessee Valley Authority concerning the question of a power shortage in the TVA area.

J. A. Krug, manager of power for TVA, telegraphed C. S. Lynch, executive vice president of the AP&L, a demand that he "act at once to correct erroneous statements attributed to you at a conference with Governor Adkins Saturday" [May 31st]. Mr. Krug did not specify any particular statement made by Mr. Lynch at the conference, called by Governor Adkins to determine the amount of reserve power available to proposed national defense plants in Arkansas. But it was apparent that the TVA official resented a reference to any "shortage" on the TVA system, it was said.

It was reported Mr. Lynch's only reference to a shortage was: "The TVA was caught short with an overabundance of industries on its system when the drought reduced power production at hydroelectric plants." And: "Our company put 500,000 kilowatt hours into the TVA system last Friday."

California

PG&E to Proceed

THE Pacific Gas and Electric Company was directed by the Federal Power Commission on June 6th to proceed with construction of its Cresta and Pulga power plants on the North Fork of the Feather river under the original terms of the license.

The commission, according to press dispatches, refused to extend the license period from thirty-five to fifty years and denied the company's request for modification of provisions in the original license relating to the

company's Big Bend power development located below the proposed Pulga plant.

The commission, asserting that the "actions of the applicant have not been marked by candor or frankness," added it was "apparent that failure of the applicant to advise the commission of its construction schedule and its decision to construct additional generating capacity was due to conflicting purposes which it desired to achieve."

The company had asked for a license for construction of two large hydro power developments to "give it further control over that

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important stream," said the commission, which added, "at the same time it opposed construction by the United States of any steam-generating capacity which might be used in competition with its power system.

The reference was to the Antioch steam

plant designed by the government as part of the Central Valley project. The commission said the company "used its decision to construct 82,000 kilowatts of additional generating capacity as an argument against any appropriation by Congress" for the Antioch plant.

Illinois

RFC Ready to Help

JESSE Jones informed Mayor Kelly of Chicago recently that the Reconstruction Finance Corporation was prepared to assist the city in getting a unified transportation system by making a sound loan on favorable terms. The Federal Loan Administrator said that it was not the position of the RFC to tell the people of Chicago what kind of ordinance they shall pass, but any loan that the RFC may make "must be upon a self-liquidating basis."

He said that projected revenues from a "unified" transportation system should be sufficient to service the loan and keep the system in physical condition to meet the requirements both in upkeep and extensions.

Federal District Court Judge Michael L. Igou, at a recent hearing on the traction situation, urged speed by the city council in the drafting of a new unification ordinance and continued the hearing to June 27th.

The ordinance then pending before the transportation committee of the council did

not provide for inclusion of the Chicago Motor Coach Company in the unified system as stipulated by Jones as a necessary condition to the granting of an RFC loan.

Offers Power Project Bill

REPRESENTATIVE C. W. Bishop, Republican of Illinois, last month introduced a bill in Congress to authorize creation of a power project in southern Illinois to produce more than 1,500,000 horsepower a year.

Bishop said the bill called for the creation of a series of reservoirs, and the erection of generating plants at the mouth of coal mines in the coal fields of southwestern Illinois. By elimination of the haul of coal, he said, and using gravity for water in the condensers, "energy can be sold at two mills per kilowatt. The entire plan can be developed, ready for operation in two years, and the first block of 78,000 horsepower can be made available one hundred and twenty days after the work is authorized."

Indiana

Rural Power Conference Held

IF the threatened power shortage becomes acute, Indiana's cooperative rural electrification organizations may be forced into generating their own current on a large scale. The possibility, although regarded as remote, was cited by Richard A. Dell, regional head of the Federal Rural Electrification Administration, who met at Indianapolis last month with representatives of 40 of the state's 44 REA projects.

"We might have to lend money to the co-operators if a shortage develops," Dell said. "But it would have to be a real shortage, and so far as we can see now facilities are ade-

quate in the state for expected demands."

Indiana REA projects purchase electricity from municipal and private utilities and act only as distributors.

Dell reported that applications for REA construction in the state approximated \$1,000,000 and that twice that amount was expected to be spent.

The bulk of the expansion will be concentrated on short extensions to existing systems and possible construction of a power line to the proposed Army camp near Columbus.

Dell said with \$20,735,000 already invested in the Federal electrification program in the state, Indiana stands third in the nation in dollars spent under this program.

Kentucky

Utilities Helping TVA

THE five major electric utilities serving Kentucky had a surplus of 116,602 kilowatts on June 1st, and anticipated that new capacity would exceed defense industrial capacity by 110,824 kilowatts on January 1, 1943, it was announced recently by the chairman of

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the Kentucky Public Service Commission.

Chairman John Kirtley made the report after a survey prompted by the current shortage in the industrial Southeast, caused by the prolonged drought that crippled hydroelectric generators of the Tennessee Valley Authority. "In addition to having an adequate power reserve for present and future needs in this state," Kirtley reported, "several of the major utilities are sending considerable power into the TVA system to help relieve a shortage due largely to the uncertainty of hydro power generation during periods of drought."

"The commission," Kirtley continued, "believes that every user of electricity in Kentucky can continue his normal and necessary usage of power without curtailment."

The best illustration of the extent of reserve

power reported by the commission was said to be this: It exceeds by one-sixth the reported maximum load of the Louisville Gas & Electric Company, which serves Louisville and adjoining areas.

By coincidence, Kirtley said, the Kentucky commission and the Federal Power Commission asked utilities to make virtually the same report on the same day. The FPC's interest, Kirtley said, also was the acute shortage that may lead to civilian rationing of available current in the defense industrial area served by TVA.

Three of the Kentucky companies already are furnishing some power to TVA, Kirtley said. In addition, four of the Kentucky companies have interlocking connections for the transfer of current from one to another.

Maryland

PSC Counsel Appointed

JOSEPH Sherbow, for the last two years people's counsel to the state public service commission, on June 15th was promoted by Governor O'Connor to the general counselship of the utility regulatory body. Mr. Sherbow, who during the two years as people's counsel has obtained rate reductions from every major utility operating in the state, succeeded J.

Purdon Wright as the commission's general counsel. Mr. Wright was named to the \$4,800-a-year post in 1935 by the late Governor Nice. Mr. Sherbow's appointment also is for a term of six years.

It was understood that the governor would take no steps to fill the post of people's counsel until pending rate negotiations and litigation instituted by Mr. Sherbow have been concluded.

Michigan

Utilities Hit Plan

MICHIGAN'S two largest gas utilities, the Michigan Consolidated Gas Company, serving the Detroit area, and Consumers Power Company, serving outstate communities, united before the state public service commission last month in opposing Detroit's request that the Consumers' proposed new Texas natural gas line into Michigan be connected with Detroit.

James H. Lee, Detroit assistant corporation counsel, claimed that integration of Detroit's natural gas line and the new line, which would bring Texas natural gas to 66 Michigan communities now using manufactured gas, would give both companies a substitute line for emergencies, and make it unnecessary for the two companies to maintain expensive gas manufacturing equipment. That equipment is included in the investment on which they base their rates.

Kit F. Clardy, Consumers' attorney, objected to Detroit's intervention in the case on the grounds that "Detroit has no interest in the outstate pipe line."

William G. Woolfolk, president of the Consolidated Company, in a letter to John J.

O'Hara, commission chairman, said his company "could not for one minute entertain the idea of abandoning its manufacturing equipment."

He said that, because of the national defense program, it is certain there will be periods this winter when Detroit will require more gas than the pipe line carries, and the supply must be supplemented with manufactured gas. "Any interference with the company's facilities for furnishing the Detroit public gas, particularly at this critical time, cannot fail to have serious and far-reaching consequences," he wrote.

Warning that Detroit is "paying and paying and paying" for the mistakes it made when it switched over to natural gas, city officials on June 12th laid before a score of outstate officials the problems of a changeover and suggested collaboration among all cities in the state in seeking lower rates.

The warning was given at a meeting in the city council chamber where Council President Smith, long-time opponent of the Michigan Consolidated Gas Company, presided. Smith explained that he had called the meeting because of the plan by which a network of Consumers Power Company customers throughout the system would be tied on the

PUBLIC UTILITIES FORTNIGHTLY

Panhandle Eastern Pipe Line which brings Detroit its natural gas. He introduced the assistant corporation counsel, James H. Lee, who explained the dangers of an inconsidered natural gas contract.

Rate Cut Planned

A. C. MARSHALL, president of the Detroit Edison Company, last month announced that the company intended to reduce electric rates to residential consumers. The base rate, he said, would be reduced to 8 cents from 9 cents for the first 10 kilowatt hours, making "a reduction in our earnings estimated at about \$700,000 a year." The remainder of the com-

pany's rate structure would remain the same.

This change, Mr. Marshall said, will benefit every residential customer in the city, and the percentage of savings will be greater for the small customer than for the large one. He said it had been the company's desire for some time to make, when conditions warranted it, "a reduction in our rate for residence service. At present our earnings are good, due largely to the sale of power for defense work. However, no one knows how long this will last, and there are other uncertainties in the immediate future regarding many major items of expense, such as rising prices of coal and almost all other supplies; and, still more important, the increase in Federal taxes."

Minnesota

Block Gas Extension

ALLEGATIONS that attempts have been made by three corporations — the Northern States Power Company, Minnesota Northern Natural Gas Company, and the Koppers Coke Company—to block extension of natural gas service in St. Paul were made before the city council last month.

They were contained in a brief filed with the council by the Minnesota Gas Corporation, which asked that the council submit to the voters two franchise ordinances permitting it to give natural gas service in the city. One proposed franchise would cover industrial service and the other would cover distribution of natural gas for commercial and domestic use.

Among the allegations made in the brief were the following:

That there is a stock ownership between the Minnesota Northern Natural Gas Company and the Koppers Coke Company, which supplies manufactured gas to the Northern States Power Company, for present distribution in the city.

That the Minnesota Northern Natural Gas Company, through a subsidiary, the People's Natural Gas Company, is operating in St. Paul for two industries under its seventh 1-year permit, whereas only three successive 1-year permits are allowed by the city charter.

That present operating permits to the Northern States Power Company are illegal, because a 1935 legislative act authorizing them allegedly is unconstitutional.

That a survey has shown that the latter company can save \$200,000 a year for the 13 largest industries and public buildings in the city by natural gas service, and \$25,000 a year by serving certain public schools.

That the Northern States Power Company intends to use and has made a deal to use natural gas as fuel at its new High Bridge power station addition.

Introduction of the brief followed introduction of an ordinance for a permit for the Northern States Power Company, extending permission to continue operating gas, electric, and steam service in the city until 1950. This was introduced by W. A. Parranto, commissioner of public utilities.

Missouri

City Loses Tax Suit

THE city of St. Louis again lost its suit to collect \$473,419 in taxes from the Laclede Power & Light Company of St. Louis for use of the city streets from 1929 to 1933, inclusive, when Division No. 2 of the Missouri Supreme Court on June 10th affirmed a St. Louis Circuit Court judgment for the power company.

The city attempted to collect the amount under an ordinance, first enacted in 1884 and reenacted in 1917, which imposed a tax of 5 per cent of the gross receipts of electric power

companies for use of the city streets.

Supreme Court Commissioner Henry J. Westhues sustained a ruling by Circuit Judge Charles B. Williams that the levy was a rental charge and not a license tax, and that the company's franchise under the circumstances precluded application of the ordinance to the company. The recent ruling, in an appeal by the city, turned on the question of whether the levy was a rental charge, as contended by the company, or a license tax, as asserted by the city. Commissioner Westhues' ruling that it was a rental charge was approved by all of the judges of Division No. 2.

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New York

Starts Reserve Unit

THE Niagara Falls Power Company, subsidiary of Niagara Hudson Power Corporation, last month placed its Edward Dean Adams hydroelectric generating station in active service on authorization of the Federal Power Commission to divert 5,000 cubic feet of water per second from the Niagara river for production of energy, which is to be used by manufacturers in the Buffalo area to increase output of defense goods.

This action has added 50,000 kilowatts to the generating capacity of the Niagara Falls Power Company, and already two companies in the district have indicated they would use an additional 18,000 kilowatts of energy and other manufacturers also were expected to apply for more electricity.

The Adams station has a total capacity of 80,000 kilowatts, and with the placement of this 50,000 kilowatts of equipment in service there will remain unused 30,000 kilowatts of generating facilities. The station has been held in reserve for stand-by service since 1924.

For more than five years the Niagara Hudson system had sought to put the facilities of the Adams station in service, but had been prevented from doing so by various state and Federal agencies questioning the advisability

of permitting a private utility to use that stream in its operations. Recent rapid expansion of industrial activity in the area as a result of the rearmament program, however, altered the situation, with sharp increases in requirements for energy.

FPC Disallows Proposed Increase

THE Federal Power Commission on June 14th announced its order and Opinion No. 62 disallowing proposed increased rates for natural gas sold by the Home Gas Company of Binghamton to five distributing companies in that state. The order and opinion followed a finding by the commission that the Home Company had not met the burden of proof in support of its contentions imposed upon it by the requirements of the Natural Gas Act.

Authority to receive revenue under the increased rate schedules was provisionally granted to the company by the commission last January, subject to the filing of a \$150,000 bond and pending final action by the commission. The recently announced order directed the company to refund the excess collected under the increased rates within thirty days, with interest thereon at 6 per cent, and reinstated the lower rate schedules.

North Carolina

State REA Approves Projects

THE state Rural Electrification Authority, already planning to spend more than \$2,000,000 during the next fiscal year, last month tentatively approved four projects to cost \$580,000. The state group made the announcement after conferring with Federal REA authorities. Tentatively approved were:

The Surry-Yadkin Electric Membership Cooperative of Dobson, \$30,000 for 33 miles of lines for 102 customers in Surry, Yadkin, Stokes, and Forsyth counties.

Caruso Electric Membership Cooperative of

Clyde, \$250,000 for 250 miles of lines for 1,000 consumers in Haywood, Transylvania, Jackson, Swain, and Graham counties.

South River Electric Membership Cooperative of Stedman, \$75,000 for 85 miles of lines for 275 customers in Cumberland, Sampson, Johnston, Harnett, Hoke, Wayne, Robeson, and Bladen counties.

Approval also was given the operation of lines in Clay and Cherokee counties by the Blue Ridge Electric Association, Inc., of Young Harris, Georgia. The Georgia cooperative had asked \$45,000 to build 50 miles of lines to serve 291 customers.

Ohio

Demands Lead to Deadlock

MAJOR Edward Blythin said recently that he did not agree with the conclusion of the Cleveland Railway Company board of directors that the city council should approve, in ordinance form, the terms he had proffered for city purchase of the company.

That was said to mean that a new stalemate

between the city and railway had developed and that Blythin would quite likely go ahead and appoint a municipal transportation commissioner, charged with setting up a city-owned bus system to supplement Cleveland Railway service.

Blythin repeated a previous statement that the offer to buy the company on the basis of \$45 a share for its stock was as definite as he

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could possibly make it and that council action should be one of the latter stages of the projected transaction in the event that railway stockholders should consent to accept the \$45 figure.

Mayor Blythin had asked the railway board to submit his offer to the stockholders, but the directors informed him that they would not do so until he could propose specific terms, backed by a council ordinance.

Pennsylvania

Utility Bill Defeated

THE Moran municipal utility bill, a perennial controversy in the state legislature, on June 4th was defeated 90 to 56 in the state house of representatives.

Sponsored by Representative J. P. Moran, Turtle Creek Democrat, the bill proposed authorizing cities, boroughs, and townships to own and operate electric, gas, steam, water, and sewage disposal utilities and sell service outside their own corporate limits.

South Carolina

Utility Sale

GOVERNOR Burnet R. Maybank last month said negotiations for the South Carolina Public Service Authority to acquire properties of the old Associated Gas and Electric

system in South Carolina were "near completion" and an agreement probably would be reached shortly. He made the statement after a conference in Washington, D. C., attended by representatives of the state-operated authority, receivers of Associated, and others.

Texas

Rate Cuts Sought

A 3-PHASE utility rate reduction program for Dallas, designed to produce lower charges for gas, telephone, and possibly water, was in full swing last month with developments due to come rapidly, Utilities Supervisor Frank R. Schneider and Acting City Manager V. R. Smitham said recently.

Schneider said he had filed an application with the Southwestern Bell Telephone Company for a reduction in rates totaling \$350,000 a year and a full report showing Dallas is entitled to substantial reduction in gas rates would be completed before the end of June.

Smitham also said he had asked for full information on water rates and services now produced by the municipal waterworks system, and that he hoped reduced rates could be worked out for practically all consumers when a current survey has been completed.

Action on the telephone rate situation went into high gear on June 6th after negotiations ended with a reduction being granted at Houston. Schneider asked for the same reductions for Dallas, as rates are the same as those for Houston. If his plan is successful, the rates would be as follows:

Straight-line residential telephones to be reduced from \$4 to \$3.50 a month; 2-party residential phones from \$3 to \$2.75 a month; 4-party residential phones \$2.50 to \$2.40 a month; business telephones from \$9 to \$8.50 a month.

The utilities supervisor has spent several months in the intensive study of the gas rate situation. In pressing for a reduction, Schneider said he would point out that Dallas is the largest customer of the Lone Star Gas system, the company that controls the Dallas Gas Company. This would make it possible, he said, for a reduction to be made in the 40-cent gate rate without disturbing other patrons of the system, if such a step is necessary to reduce Dallas Gas Company rates.

A request that the Federal Power Commission send help immediately to Dallas in seeking relief from gas rates was recently filed by the utilities supervisor on behalf of the city after the councilmen decided this was the next necessary step in the campaign.

Mayor Pro Tem Ben E. Cabell, chairman of the council's utility committee, said the city would ask the Federal agency to send technical assistants to Dallas and do whatever else is necessary toward getting the gate rate reduced. This is within the commission's jurisdiction, Cabell said, since the Lone Star system is engaged in interstate commerce.

The resolution adopted by councilmen by unanimous vote authorized Utilities Supervisor Schneider to file any petitions "as may be appropriate to secure relief from the unjust and unreasonable city gate rates charged by the Lone Star Gas Company to its affiliate, the Dallas Gas Company." Schneider's report on conditions filed with the council was caustic in its description of conditions in Dallas.

The Latest Utility Rulings

Controlling Influence Makes Company an Affiliate of Holding Company



APPLICATIONS by the Panhandle Eastern Pipe Line Company and Columbia Oil & Gasoline Corporation for orders, under § 2 (a) (8) of the Holding Company Act, declaring them not to be subsidiaries of the Columbia Gas & Electric Corporation and other designated corporations, were denied in part for failure to show that their management and policies were not subject to a controlling influence by the holding companies. They were granted conditionally in so far as it appeared that one of the holding companies did not exercise control or a controlling influence over one of the applicants.

The commission, in discussing the basis for a declaration as to subsidiary status, referred to certain important veto powers which might prevent the creation or issuance of securities or a merger, consolidation, sale, or lease of property. Taken together with other factors, the existence of this power was said to be significant in indicating the existence of a controlling influence. The commission said that when other factors indicate the absence of control or controlling influence within the meaning of § 2 (a) (7) or 2 (a) (8) of the Holding Company Act, it may be that the possession of veto power over corporate changes is not exclusively determinative, but this does not mean that the commission can ignore the cumulative effect of such a veto power

when other factors of control exist, as they did in this case.

In regard to the effect of a consent decree of a Federal court under the Anti-trust Laws, the commission said it could not and did not desire to explore the question of whether the history of an applicant, since the date of the decree, indicated any violation of its terms. Nevertheless, it concluded that the decree had not operated to negate the existence of control or a controlling influence within the meaning of § 2 (a) (8), and the findings of the commission were limited exclusively to the issues arising under that section.

Considering a clause in an indenture to secure bonds providing for the approval of the majority stockholders in case of further financing, the commission made the following statement:

It has been urged upon us that the Department of Justice "had no objection" to inclusion of the stockholders' consent clause. But even the express approval of the Department would be of no relevancy to the issue here. As we have already stated, we are not concerned with the construction of the consent decree. The only question we have to decide is whether the evidence before us demonstrates a lack of control or controlling influence as those terms are used in § 2 (a) (8) of the Holding Company Act.

Re Panhandle Eastern Pipe Line Co. et al. (Release No. 2778, File Nos. 31-109, 31-493, 31-108, et al.).



Sufficiency of Acts of Commission As a Collective Body

AN order of the Texas Railroad Commission granting a certificate of convenience and necessity was attacked in a Texas court on the ground that the com-

mission did not act as a collective body and did not hold a meeting, but the commissioners acted as individuals only. It was contended that two commissioners

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purportedly executed the order and certificate but not as a result of any meeting, as they acted separately and as individuals at different times and at different places.

These contentions, as well as others directed at the validity of the order, were not sustained by the court.

The application for operating authority had been presented before a duly appointed examiner of the commission. Testimony was reduced to writing in question and answer form and was delivered to one of the commissioners. He testified before the court that another commissioner, on account of illness, was confined to his home and to a hospital and that a third commissioner was absent from his office most of the time during the consideration of this application. Conferences were held at the home of the ill commissioner and at the hospital. The first commissioner read over the testimony and discussed it with him, and they decided to grant the application. Both

commissioners signed the order although the signature of the ill commissioner was affixed by his secretary by his authority. The court said in part:

The statutes do not require that notice of the meetings of the commission to transact its business be given any of the commissioners. Nor do they require that all members be present, but to the contrary provide that two or a majority of the commissioners may transact its business. The law assumes that each commissioner will make himself available and will keep up with the business of the commission, and also assumes that on many occasions all of the commissioners cannot be present.

The court was further of the view that since the commission made its decision at a meeting held for that purpose, the matter of signing or executing the order became a ministerial function which could be, and as to one commissioner was, delegated to duly appointed and acting subordinates in the office. *Sunshine Bus Lines, Inc. v. Texas R. Commission, et al.* 149 SW(2d) 228.



Dissolution of Intermediate Holding Company during Integration Proceedings

THE Securities and Exchange Commission prohibited The North American Company from voting its stockholdings in the North American Light & Power Company at a special stockholders' meeting for the purpose of authorizing a dissolution of the subsidiary registered holding company. The North American Light & Power Company was at the same time prohibited from holding the meeting for any purpose other than to adjourn, and was prohibited from taking any action pursuant to the dissolution and liquidation provisions of the General Corporation Laws of the state of Delaware, except pursuant to further order of the commission.

It appeared that The North American Company owned 85 per cent of common stock and nearly 44 per cent of preferred stock, in addition to owning about 62 per cent of debentures. If dissolution and liquidation were effected as proposed,

The North American Company would receive a total of nearly \$15,000,000 on account of debentures and preferred stock for which it paid less than \$8,000,000. Owners of publicly held securities would, under such liquidation, receive only approximately \$15,000,000 with respect to securities having a stated value of over \$20,000,000.

The proposed dissolution, said the commission, would involve many complicated questions of law and fact as to the manner of dissolution and the respective rights of security holders to assets. No plan for divestment of control, assets, or securities had been filed with the commission pursuant to § 11 (e) of the Holding Company Act or otherwise. The commission concluded:

The proposed action by North American and by Light & Power will hinder and obstruct the taking of such action as the commission may find necessary for such hold-

THE LATEST UTILITY RULINGS

ing companies and their subsidiaries to take in order to comply with the provisions of § 11 (b) of the act, and with any final order of the commission in this proceeding (integration proceeding under § 11).

Such proposed action constitutes a step toward the disposition of securities or as-

sets subject to the commission's jurisdiction under § 12 (d) of said act and the rules thereunder.

Re North American Co. et al. (File No. 59-10, Release No. 2797).



Unsatisfactory Debt Ratio Shown in Refunding Program

A DECLARATION by a registered holding company regarding the issue and sale of first mortgage bonds and promissory notes in connection with a refunding program was permitted to become effective under § 7 of the Holding Company Act, subject to the condition that \$200,000 per annum be set aside from the net income of the holding company, which amount would be unavailable for dividends on preferred or common stocks.

This condition was imposed by the Securities and Exchange Commission with the consent of the company because of the unsatisfactory capital structure of the company. It appeared that the total debt was 67.96 per cent of gross property, plus investments less a write-up, and 75.63 per cent of depreciated property, plus investments less write-up.

The first consideration which led the commission to the conclusion that the refunding should be permitted was that the companies involved, in order to meet the problems presented by certain restrictive provisions of a trust indenture and in order to comply with the provisions of § 11

(b) of the Holding Company Act, had agreed to go forward with a comprehensive plan looking toward the sale of certain of properties. If the sale were consummated as proposed, the total long-term debt would be substantially decreased. The property account would be increased as a result of construction, and the surplus account would be increased by the profit on such sale.

Another consideration which the commission took into account was the fact that a parent company would own all of the outstanding securities of the issuing company with the exception of certain bonds which would be held by a single investor and which would represent 41.24 per cent of the total capitalization. Moreover, the proposed trust indenture placed certain restrictions on payments of principal to be made by the issuing company on notes to be issued to the parent company.

The effect of this provision was virtually to convert these notes into equity securities in all but form. *Re General Public Utilities, Inc. (Release No. 2783, File No. 70-277).*



Accounting for Reconditioned and Reused Property

CRITICISM was made by Commissioner Brewster, of the New York commission, as to the accounting by a water company for improvements involving the reconditioning and reuse of water pipes. Cost of cleaning and painting reused pipes, it was declared, should have been charged to operating expenses instead of capital account. Cost of removal should have been charged to depreciation reserve. A payment to a contractor for

removing pipe and conveying it to a stockyard was said to be a proper charge to depreciation reserve. Discussing errors in accounting, Commissioner Brewster said:

The company retired 3,589 feet of 6-inch pipe at \$2,400, that being the original cost of the 6-inch pipe and the cost of installing it at the time that it was installed. This retirement is approximately correct, although there is a slight difference explained hereafter. However, the company charged their

PUBLIC UTILITIES FORTNIGHTLY

materials and supplies account with \$600 for this 3,589 feet of 6-inch pipe removed, or an average of 16.7 cents per foot. They also charged materials and supplies with the cost of removal, totaling \$1,196.70. They then cleaned and reused 777 feet of this 6-inch pipe in place of 777 feet of 4-inch pipe removed. This reused 6-inch pipe was placed in the same trench from which the 4-inch pipe was removed. In this transaction the company used a salvage value of 20 cents per foot plus a cost of 30 cents per foot for removal and entered in the fixed capital account \$388.50 for this reused 777 feet of 6-inch pipe. This was incorrect, because in the first instance they should not

have taken into the materials and supplies account the \$1,196.70 cost of removal of the 6-inch pipe but should have charged depreciation reserve with that amount. Had this been done there would have been in the materials and supplies account only the salvage value of the 6-inch pipe at 16.7 cents per foot. In that case this pipe would have been returned to the capital account at 16.7 cents per foot rather than the 20 cents per foot placed in the capital account by the company.

Re Sylvan Spring Water Co. Case No. 10425.



Sanitary District Not Permitted to Operate Water Utility

AN application by a sanitary district for authority to operate as a public water utility was denied by the Wisconsin commission on the ground that the law did not authorize such a district to be a public utility or to function as such. Section 196.01(1) of the Wisconsin Statutes defines a public utility to mean and embrace certain corporations, towns, villages, and cities. The commission did not consider that those specified included a sanitary district organized under § 60.30-60.309. The commission continued:

A sanitary district is not a town, city, or village. It may or may not be a municipal corporation, but a determination that it is a municipal corporation would not alter our conclusion, since we construe the word "corporation" in § 196.01 (1), Statutes, to refer only to private corporations. This construction seems to us to be necessitated by the specific designation in the statute of municipal corporations that are or may be public utilities. This designation indicates the legislative intent that the only municipal corporations to be given the powers and duties of public utilities are towns, villages, and cities.

Re Sunset Sanitary District (CA-1766).



Electric Rates in City Based on Value of Investment In Property for Electric Service

THE supreme court of Florida, in reviewing circuit court orders in litigation wherein rate orders of the Tampa Utility Board were challenged, held that not all the property owned by an electric company and located within the city of Tampa was to be used as a basis for rate making, but only that property used exclusively for the purposes of the electric utility and that part of other unseverable property used proportionately by the utility for the purpose of its function and used at the same time for other purposes. In the words of Justice Buford, speaking for the majority of the court:

that some of the property involved is used for at least four separate and distinct purposes, viz.: (a) the operation of an ice plant or plants; (b) the operation of a street railway system; (c) the production of electric current for distribution of power and lights in a wide area beyond the limits of the city of Tampa; and (d) the production of electric current to furnish power and lights for the municipality and the public within the same.

The court took the position that property used for street railway and other operations, aside from electric utility service, and also property devoted to electric service outside the city limits, should be excluded.

The court was of the opinion that the board was justified in using the present

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THE LATEST UTILITY RULINGS

"fair value" of the applicable property as the basis of valuation for rate-making purposes instead of using the actual cost or investment value and making deductions or additions for depreciation or betterments.

The statute under which the board operates provides for a 7 per cent return on the "just and true valuation of the investment of the utility within the city." *Tampa Electric Co. v. Watson et al.* 1 So (2d) 739.



Rules Adopted to Improve Taxicab Service

TAXICAB service in Baltimore city, declared the Maryland commission, had become so undependable that numerous complaints were made, with the result that the commission instituted an investigation to determine what measures were required to be taken to render the service more dependable and otherwise satisfactory.

The investigation, it was said, disclosed a general lack of supervision and direction of the service by taxicab owners and a lack of control and direction of the drivers, which made dependable response to telephone calls for service impossible. The commission adopted certain rules for the purpose of improving the situation.

Dependable response to telephone calls for cabs was said to be an essential feature of satisfactory taxicab service. Therefore the commission adopted a rule requiring drivers to make a maximum use of telephone facilities, using an adequate number of well-distributed stands with telephone connections.

It did not seem to the commission to be possible to obtain dependable call service without limitation of cruising.

Accordingly the commission adopted a rule limiting cruising.

A system of operation employing what was termed the "minimum booking requirement," or the "nut" system, was condemned as plainly illegal. A statute makes it unlawful for the owner of any taxicab to enter into any contract or arrangement with an operator by the terms of which any operator pays to, or for the account of, such owner a fixed or determinable sum for the use of the taxicab, and is entitled to all or a portion of the proceeds arising from its operation.

The commission felt that adequate inspection and supervision of the service was essential, but it could not be provided precisely as recommended by a cab association as the commission did not have legal authority to assess the industry for such purpose, nor to administer a service financed by the industry. It was said that supervision must be provided by the owners, with such assistance as could be given by the commission and the police department. *Re Operation of Taxicab Owners Operating in Baltimore City* (Case No. 4448, Opinion and Order No. 37035).



Only Regulated Forms of Transportation Considered on Competition Question

THE North Dakota commission, in granting authority to operate a motor carrier service, ruled that it is necessary to give consideration only to regulated forms of transportation in its consideration of the effect of a proposed service on other essential forms of transportation and existing facilities in the

territory for which a certificate is sought. In other words, said the commission, shipper-owner transportation, not requiring a certificate of public convenience and necessity under the statutes, and other private carriers are not included in the requirement of the statute.

The commission also discussed the

PUBLIC UTILITIES FORTNIGHTLY

meaning of public convenience and necessity.

It was said that the word "public" does not refer to all of the public, or to any particular portion of it. Nor is it the convenience and necessity of the ap-

plicant with which the statute is concerned. Public convenience and necessity refers rather to the convenience and necessity of a portion of the general public. *Re Theel Brothers Rapid Transit* (Case No. M-653, Sub. No. 1).



Other Important Rulings

THE California commission held that the transfer of a passenger stage right granted to a railroad did not result in the "splitting" of an operative right, or in the creation of a new right, merely because the railroad intended to continue rail operations. *Re Sacramento Northern Railway et al.* (Decision No. 34014, Application No. 23930).

The supreme court of Minnesota held that the application of a railroad for a certificate of public convenience and necessity stands upon the same basis as that of any other applicant, and where the commission is guided in its findings by the applicable rules of law and its findings are supported by the evidence, an order denying authority to operate a motor carrier service is not unlawful and unreasonable. *Re Minneapolis & St. Louis Railroad Co.* 297 NW 189.

The New Hampshire commission dismissed a protest against discontinuance of agency service at a railroad station where discontinuance would not result in unreasonable or inadequate service and the proposal to discontinue was for the purpose of reducing operating expenses. In the majority opinion it was said that a dissenting commissioner would substitute, as a guide in station cases, the excess of revenues over expenses rather than the necessity for or the adequacy of the existing or proposed service and that the policy of such a guide was illustrated in the instant case where revenues were substantially all from carload traffic and use by, and revenues from, other sources of traffic were

negligible. *Order of Railroad Telegraphers v. Boston & Maine Railroad* (D-T2077).

The fact that proceedings for review are commenced and pending does not suspend orders or decisions of the commission, it was declared in a decision of the Colorado commission denying a motion to dismiss a proceeding instituted because of alleged violation of an order involved in litigation. *Rocky Mountain Motor Co. v. Pikes Peak Auto Livery* (Case No. 4835, Decision No. 16949).

The United States Supreme Court held that authorization by the Interstate Commerce Commission was necessary for the transfer of a certificate of convenience and necessity of a motor carrier, notwithstanding the provisions of § 213 (e) of the Motor Carrier Act, 49 USCA § 313 (e), relating to an exception, where not more than twenty vehicles are involved, and the court also held that the Interstate Commerce Commission had authority to enact a rule that no attempted transfer of an operating right should be effective until approved by the commission. *United States v. Resler et al.*

A municipality seeking the acquisition of the works and plant of a water company which is reluctant to sell and convey them must secure a certificate from the commission in the first instance, according to a ruling of the superior court of Pennsylvania. *Borough and Town Council of Borough of Pottstown v. Pennsylvania Public Utility Commission*, 19 A(2d) 610.

NOTE.—The cases above referred to, where decided by courts or regulatory commissions, will be published in full or abstracted in *Public Utilities Reports*.

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COMPRISING THE DECISIONS, ORDERS, AND
RECOMMENDATIONS OF COURTS AND COMMISSIONS



VOLUME 38 PUR(NS)

NUMBER 4

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RE ADAMS ELECTRIC CO-OPERATIVE, INC.

MARYLAND PUBLIC SERVICE COMMISSION

Re Adams Electric Coöperative, Incorporated

[Case No. 4456, Order No. 37090.]

Monopoly and competition, § 54 — Restraint on extensions — Project area of coöperative.

1. An electric utility company should not be restrained from extending lines into the "project area" of a rural electric coöperative on the ground that they are "spite lines" interfering with the coöperative project where the extensions are needed and the activity of the company in making such extensions, although perhaps stimulated by the prospect of coöperative service, is essentially beneficial, p. 194.

Monopoly and competition, § 54.1 — Rural electric coöperatives — Adequately served territory.

2. A coöperative electric corporation should not be permitted to render central station rural electric service in territory adequately served by an electric utility company, p. 196.

Certificates of convenience and necessity, § 82 — Grounds for denial — Foreign incorporation.

3. The long-established policy of the Commission is not to permit foreign corporations to engage in utility business in the state except when reasonably satisfactory service cannot be obtained from a domestic corporation, p. 196.

[May 2, 1941.]

APPPLICATION by electric coöperative corporation for authority to construct an electric system and for order restraining construction by an electric utility company; proceeding dismissed.

APPEARANCES: Daniel E. Teeter, Harry Lamberton, and Miss Helen Moss, for Adams Electric Coöperative, Inc.; Marshall, Carey and Doub, and W. Clinton McSherry, for the Potomac Edison Company; E. M. Sturtevant, for Consolidated Gas Electric Light and Power Company of Baltimore; Joseph Sherbow, People's Counsel.

By the COMMISSION: The Adams Electric Coöperative, Inc., a Pennsylvania corporation, made application

to this Commission for authority to render central station rural electric service in portions of Frederick and Carroll counties, Maryland, comprising what it termed the "Project Area," and prayed that the Potomac Edison Company, Consolidated Gas Electric Light and Power Company of Baltimore, and other utilities serving adjacent territory be restrained from constructing any electric lines in the "Project Area" and that they be ordered to remove any lines which have been constructed in said area.

MARYLAND PUBLIC SERVICE COMMISSION

The petition averred that a great number of persons had requested service; that the "Project Area" does not receive central station service; that there is urgent need for service therein; that the companies now serving adjacent territory have repeatedly refused to extend lines into the "Project Area" upon reasonable terms; that the Potomac Edison Company intends to serve only the more densely settled portions, whereas petitioner proposes to serve as many residents as is "economically feasible" and as desire to become members of the coöperative; that petitioner proposes to build 172.9 miles of lines, starting construction within ninety days from the date of the Commission's order of approval. It was averred, also, that the Potomac Edison Company has no right to operate in the "Project Area."

The application was filed on March 27, 1941, and was assigned for hearing on April 15th. The hearing occupied seven days. Petitioner's first witness was its engineer, who introduced a set of blue prints showing the general location and extent of the proposed lines and the location of all persons who had applied for membership and of others to whom service would be made available by the proposed lines but who do not desire service at this time. The maps indicated that 379 persons had signed applications for membership, of whom 68 are located in Carroll county, and that there are, in addition, 193 dwellings near enough to be served whenever the occupants are desirous of service.

Twenty-five members testified as to their desire for service, and expressed the belief that service is not available from the Potomac Edison Company

at a cost which they can afford to pay, but six of them had not applied for service at any time and twelve had not applied during the past three years. This is significant, as the terms of the company's plan for extending rural service have been substantially liberalized during that period, the most recent change having been filed with the Commission on March 4, 1941.

[1] Early in December, 1940, counsel for the Adams Electric Coöperative arranged for an informal conference with the Commission, expressly requesting that no representative of the Potomac Edison Company be present. The conference was attended by a number of farmers and by representatives of the REA. At that time the Commission was told that the Potomac Edison Company, since learning of the coöperative's plan to enter Maryland, had become unusually active in extending service into areas in which members were being solicited. The lines being built were termed "spite lines," built to interfere with the coöperative project, and the Commission was asked to enter an order forbidding the company to engage in any new construction pending completion by the coöperative of the plans upon which it was engaged. Such action being without precedent, and quite contrary to the consistent policy of the Commission to stimulate extension of service to the utmost within reasonable limits, maps were obtained upon which to show the location of the farms and other premises to be served, but there was an unwillingness to give such information and the Commission would not consider issuing a general order for the company to suspend all extension of service. It did, however, have

RE ADAMS ELECTRIC CO-OPERATIVE, INC.

its chief engineer make an inspection of the lines being built by the company, with special attention to certain conspicuous examples of so-called "spite lines" and he reported that he had gone over the territory with a representative of those promoting the coöperative and that the lines being constructed were all needed to adequately serve the territory and that the company should be allowed to continue without interference.

The Commission, therefore, refused to issue the restraining order, and was not approached again on the subject by a representative of the coöperative prior to the filing of the petition in this case, on March 27, 1941.

An effort was made at the hearing to get into the record a description of the boundary of the so-called "Project Area" to determine definitely the extent of the territory which petitioner proposed to serve and from which it desired Potomac Edison Company service excluded, but counsel and witnesses for petitioner, including the engineer who prepared the maps, stated that it was not possible to define such a boundary and that the limits of the "Project Area" must be judged by reference to the lines shown in approximate location on the maps. It was admitted by counsel that compliance with the request made at the informal ex parte conference in December would have required the Commission to stop all construction by the Potomac Edison Company in all parts of Frederick county.

The construction of lines which are not required to serve public convenience and necessity, including lines built for the sole purpose of obstructing a needed service offered by another

agency, is wasteful and harmful and the Commission is ready at all times to prevent such construction, but the fact that needed extensions of an established electric distribution system interfere with a project to set up an independent competing service is not sufficient to justify the Commission in preventing or delaying the extension of service to those who are in need of it. The Commission repeats, and emphasizes, however, that it will not countenance efforts by a utility needlessly to interfere with the operation or the normal and required extension of the lines of any other utility—whether publicly or privately owned, or a coöperative—and its clear authority in this regard will be exercised whenever necessary to prevent such interference.

It is quite apparent that the prospect of a coöperative service in the territory which the Potomac Edison Company had planned to serve has stimulated that company's extension of rural service, but such activity is essentially beneficial so long as it conforms to a well-conceived plan for the economical extension of service where needed and the Commission finds no fault with it. If the company, spitefully, had refused to extend service to certain applicants because they or their neighbors had been working for the coöperative or had signed applications for membership therein, the Commission then would have condemned such spitefulness and would have required that service be given.

On the other hand, the effort of petitioner to show that service now being enjoyed, and service which is about to be made available, should be withdrawn, is essentially harmful.

MARYLAND PUBLIC SERVICE COMMISSION

Much time has been devoted to petitioner's efforts to show that the Potomac Edison Company has not received proper legal authority through this Commission for the construction of the system of power lines by which its thousands of customers are served. The destructive effect of such efforts is very apparent, and while the Commission has no doubt, whatever, that the Potomac Edison Company has the right to serve the territory in question and to extend its service therein, it deplores any effort to interfere with established service, particularly under the guise of an effort to make service available to those who are not now served.

[2] Testimony in this case indicates to the Commission that if those persons who have joined the coöperative in response to the solicitation of the seventeen paid agents who canvassed the territory, will coöperate reasonably with the Potomac Edison Company, instead of interfering, they can get service on reasonable terms more promptly than it could be obtained from petitioner. The principal difference in initial cost to the farmer is the cost of the service line leading from the company's line on the public road to the point of use, and it should be possible to materially reduce this item if the farmers will grant rights of way to the company with the same liberality as is accorded the coöperative. Witness C. L. Nau, assistant chief, division of applications and loans of REA, expressed the opinion that if the farmers had coöperatively applied for Potomac Edison service several years ago there would have been no REA project in that territory. A map, introduced in evidence

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by the Commission's chief engineer showing both the coöperative's proposed lines and the existing lines of the Potomac Edison Company, indicates that an unreasonable and wasteful duplication of facilities would result if the proposed lines were built and the Commission is convinced that the Potomac Edison service is all that is required to serve the territory adequately.

In the case of *Littleton v. Hagerstown*, reported in 150 Md 163, PUR 1926C 507, 522, 132 Atl 773, the Maryland court of appeals, referring to a proposed extension of electrical service by the city of Hagerstown into territory which this Commission has found to be already adequately served, said: "It is just such wasteful duplication which it is one of the principal functions of the Public Service Commission to prevent." The importance of avoiding unnecessary duplication of facilities is clearly indicated by the report of the administrator of the Rural Electrification Administration for 1940, in which it is said, at page 11: "With nearly three quarters of the farms in the United States still unserved, the field is broad enough to engage the best efforts of all purveyors of electrical energy—private, public, and coöperative—for many years to come."

In considering avoidable duplication of facilities, the Commission also has in mind the increasing difficulty which is being experienced in getting reasonably prompt delivery of needed equipment and the importance of making maximum use of all equipment and supplies obtainable.

[3] The Commission, having found that the proposed service is not re-

RE ADAMS ELECTRIC CO-OPERATIVE, INC.

quired by public convenience and necessity, it is needless to dwell upon objectionable aspects of the project, but mention should be made of the long-established policy of the Commission not to permit foreign corporations to engage in the utility business in Maryland. Departure from that policy has occurred only rarely, and only when reasonably satisfactory service could not be obtained from a domestic cor-

poration; therefore, when at all practicable, such coöperative electric service as may be required in Maryland should be given by a domestic corporation. It is also a fact that petitioner is not fortified with the usual franchises to permit location of lines within the rights of way of the public roads, when desirable.

An order will be entered dismissing the application.

MARYLAND COURT OF APPEALS

Howard Sports Daily, Incorporated

v.

O. E. Weller, Chairman, Public Service
Commission, et al.

[No. 18.]

(— Md —, 18 A (2d) 210.)

Constitutional law, § 11 — Due process — Equal protection — Restriction upon individuals.

1. In considering the due process and equal protection clauses of the Constitution, due regard must be given to the principle that the state may regulate and restrict the freedom of the individual to act whenever such regulation or restraint is essential to the protection of the public safety, health, or morals, p. 200.

Service, § 2 — Constitutional requirements — Telegraph service — Illegal use.

2. A Commission order refusing to require a telegraph company to furnish contract service to a corporation operating a newspaper containing horse racing news used for gambling purposes was not so arbitrary or capricious as to violate the due process clause of the Constitution, p. 200

Service, § 134 — Duty to serve — Unlawful purposes.

3. To require a public utility to furnish service and facilities for unlawful purposes would be contrary to public policy, p. 200.

Discrimination, § 228 — Telegraph — Duty to serve — Unlawful purposes.

4. The legislature, in providing that no telegraph company shall subject any person or corporation to unfair prejudice or disadvantage, did not intend to make such service mandatory where it would facilitate violation of law.

MARYLAND COURT OF APPEALS

Constitutional law, § 15 — Due process — Commission action.

5. Whether or not a corporation or person has been deprived of due process of law by Commission action depends upon whether the Commission acted contrary to the statutes and rules and with arbitrary discrimination, p. 200.

Constitutional law, § 17 — Private rights — Legislative restraints.

6. The Fourteenth Amendment to the Constitution, although protecting the citizens in their right to engage in any lawful business, does not prevent legislation prohibiting any business which is inherently vicious and harmful, p. 200.

Injunction, § 10 — Grant or refusal — Clean hands doctrine.

7. Equity will not aid any attempt to circumvent the provisions of a law designed to promote and protect the public interest by affording the extraordinary remedy of injunction, p. 200.

Service, § 134 — Grounds for denial — Unlawful use of service.

8. A telegraph company may refuse service for illegal operation not only where such action would subject it to prosecution as a participant in the illegality, but also where it would have the effect of promoting illegality, even though the company might not be liable to punishment for rendering the service, p. 201.

Constitutional law, § 1 — Freedom of press — Commission order — Denial of service.

9. A Commission order refusing to require a telegraph company to furnish contract service to a publisher of a sports sheet by transmitting horse racing news used for gambling purposes did not abridge the constitutional privilege of freedom of the press, p. 202.

Contracts, § 20 — Enforcement — Public policy.

10. No court should lend its aid to enforce a contract to do an act which is illegal, inconsistent with sound morals or public policy, or which tends to corrupt or contaminate by improper influences the integrity of the nation's social or political institutions, p. 202.

Constitutional law, § 19 — Freedom of contract — Police powers.

11. The state, in the exercise of the police power and in the interest of the public welfare, has the right to regulate and limit the right of contract, p. 202.

Appeal and review, § 34 — Commission order — Burden of proof.

12. The burden of proof is on one appealing from a Commission order to show that the order is unlawful or unreasonable by clear and satisfactory evidence, p. 203.

Appeal and review, § 67 — Commission order — Remand — Additional service.

13. Under a statute providing that if a party presents evidence which the court finds to be different from, or additional to, that offered before the Commission, the court may transmit a copy thereof to the Commission, the evidence justifying the court to remand the case to the Commission must be so substantial and sufficient that it might have the effect of making some change in the conclusion, p. 203.

Appeal and review, § 32 — Commission order — Sufficiency of evidence.

14. Commission findings and orders are prima facie correct, and the courts ascribe to them the strength due to judgments of a tribunal established

HOWARD SPORTS DAILY, INC. v. WELLER

by law and informed by experience; and the courts on appeal should not examine the facts further than to determine whether there was substantial evidence to sustain the order, p. 203.

Appeal and review, § 32 — Commission order — Grounds for reversal.

15. Commission findings, although subject to review, are, when supported by evidence, accepted as final, and the court will not disturb such findings unless the Commission exceeded its jurisdiction or arbitrarily disregarded the rights of the parties, p. 203.

Appeal and review, § 67 — Commission order — Sufficiency of evidence.

16. The court does not err in refusing to remand a case to the Commission where additional evidence is presented before it on appeal from a Commission order refusing to require a telegraph company to serve a publisher of a paper shown to be furnishing horse-racing news to be used for gambling purposes, when the additional evidence would not change the result, p. 203.

[February 19, 1941.]

A PPEAL from decree dismissing suit to enjoin a telegraph company from discontinuing service to publishers of racing information; affirmed. See also (1940) 36 PUR(NS) 62.

APPEARANCES: Samuel Carliner, of Baltimore (S. Raymond Dunn, of Baltimore, on the brief), for appellant; J. Purdon Wright, of Baltimore, for the Public Service Commission, appellee; Joseph T. Brennan, of Baltimore (Hilary W. Gans and Brown & Brune, all of Baltimore, on the brief), for Western Union Telegraph Company, appellee.

DELAPLAINE, J.: Howard Sports Daily, Inc., is appealing from a decree of the Circuit Court No. 2 of Baltimore City, which affirmed an order of the Public Service Commission refusing to require the Western Union Telegraph Company to furnish special contract service for the appellant.

In January, 1940, the Western Union agreed to furnish telegraphic service for the appellant's business of gathering and distributing sports news. The facilities included a Morse circuit extending from New Jersey to

its office in Elkridge, and a teleprinter to transmit the news to tickers in Maryland, Virginia, North Carolina, South Carolina, and Georgia. The service was rendered in accordance with a tariff filed with the Federal Communications Commission, stipulating that special contract service shall be furnished for an initial period of one month and may be cancelled thereafter upon a minimum of one day's notice by either party, and also that no facilities shall be used for any purpose or in any manner, directly or indirectly, in violation of any Federal law or the laws of any of the states through which the circuits pass or the equipment is located.

In February the telegraph company, after receiving a warning from the United States Attorney for the northern district of Illinois that the facilities were used in violation of Federal and state statutes, terminated the interstate service; but the appellant filed a

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complaint with the Public Service Commission of Maryland under Code, Art. 23, § 380, to prevent discontinuance of service within the state. The Commission passed a temporary restraining order, after which the appellant acquired its news from outside the state by telephone, but continued to transmit the news by teleprinter to customers in Maryland. The reports sent by the appellant included the entries in races, the positions of the horses at various stages of the races, the final results, and the prizes paid to the winning horses. According to witnesses who testified before the Commission on March 19, there were eleven tickers in operation in the state. In Hyattsville there were two tickers, one of which was installed in a second-floor apartment, the other in a cellar. The other nine were located in Frederick, Emmitsburg, Brunswick, Bel Air, Havre de Grace, Bladensburg, Mt. Rainier, Silver Hill, and Takoma Park. On five of the premises gambling was seen by the witnesses. It is beyond question that the contract was subject to cancellation. On April 3rd the Commission passed an order dismissing the complaint. On the same day the appellant filed a bill of complaint under Code, Art. 23, § 415, and the court enjoined the Western Union from disconnecting the telegraphic service pending determination of the case, and ordered the Public Service Commission to show cause why its order should not be vacated and annulled. After the trial the court dismissed the appellant's bill.

[1-7] The appellant complained that the order of the Commission deprived it of due process of law and denied it the equal protection of the laws

in violation of the Fourteenth Amendment to the Constitution of the United States, and Art. 23 of the Maryland Declaration of Rights, which provides that no man ought to be deprived of his life, liberty, or property, but by the judgment of his peers, or by the law of the land. Unquestionably, if a law is applied and administered by public authority "with an evil eye and an unequal hand" so as to make unjust discrimination between persons in similar circumstances, material to their rights, such denial of equal justice is within the prohibition of the Constitution. *Yick Wo v. Hopkins* (1886) 118 US 356, 373, 30 L ed 220, 227, 6 S Ct 1064, 1073. But in considering the application of the constitutional safeguard, due regard must be given to the principle that the state may regulate and restrict the freedom of the individual to act whenever such regulation or restraint is essential to the protection of the public safety, health, or morals. *Dasch v. Jackson* (1936) 170 Md 251, 262, 183 Atl 534, 539. Chief Justice Taft thus defined "due process" as guaranteed by the Fourteenth Amendment: "The due process clause requires that every man shall have the protection of his day in court, and the benefit of the general law, a law which hears before it condemns, which proceeds not arbitrarily or capriciously, but upon inquiry, and renders judgment only after trial, so that every citizen shall hold his life, liberty, property and immunities under the protection of the general rules which govern society." *Truax v. Corrigan* (1921) 257 US 312, 332, 66 L ed 254, 263, 42 S Ct 124, 129, 27 ALR 375.

The court cannot adopt the view of the appellant that the Public Service

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Commission acted arbitrarily or capriciously. To force a public utility, under the guise of impartial regulation, to furnish service and facilities for unlawful purposes would be contrary to public policy. We cannot believe that the legislature, in providing that no telegraph or telephone company shall subject any person or corporation to "unfair prejudice or disadvantage," Code, Art. 23, § 411, intended to make such service mandatory where it would facilitate the violation of the law. Whether a complainant has been deprived of due process of law and denied the equal protection of the laws by action of an administrative body depends upon whether it acted contrary to the statutes and rules and with arbitrary discrimination. *Thompson v. Spear* (1937) 91 F(2d) 430, 433. The Fourteenth Amendment protects the citizens in their right to engage in any lawful business, but it does not prevent legislation prohibiting any business which is inherently vicious and harmful. *Adams v. Tanner* (1917) 244 US 590, 596, 61 L ed 1336, 1343, 37 S Ct 662, 665, LRA 1917F 1163, Ann Cas 1917D 973. The state has the undoubted right to enact legislation in the legitimate exercise of its police power. The sovereignty of the state would be a mockery if it lacked the power to compel its citizens to respect its laws. *Allgeyer v. Louisiana* (1897) 165 US 578, 41 L ed 832, 17 S Ct 427. For example, when a complainant sought to enjoin the Maryland Public Service Commission and the Commissioner of Motor Vehicles from prohibiting him from carrying passengers for hire in this state, our court held that, since his scheme contemplated an evasion of

the law, he was entitled to no consideration in a court of equity. When the cry of "property rights" is raised in an effort to circumvent the provisions of a law designed to promote and protect the public interest, equity will not aid the attempt by affording the extraordinary remedy of injunction. *Restivo v. Public Service Commission* (1925) 149 Md 30, 37, PUR 1926A 639, 129 Atl 884, 886.

[8] It was insisted that the transmission of sports news does not violate any law of the state merely because a recipient of it puts it to illegal use, and that consequently no evidence of illegal activities on the premises of customers should have been produced against the appellant. *Harry E. Bilson*, secretary and treasurer of the appellant, asserted that while he had executed the contracts with the customers, he had never visited their places of business, and professed ignorance of the character of their operations. But it is well settled that a telegraph company has the right to refuse service which is connected with illegal operations. The company may refuse to render such service, not only where such action would subject it to prosecution as a participant in the illegality, but also where it would have the effect of promoting illegality, even though the company might not be liable to punishment for rendering the service. There is abundant authority for the principle that a telegraph company cannot be compelled to furnish reports of market prices to a bucket shop, notwithstanding its duty as a public service corporation to serve all customers without discrimination, and even though it may have executed a contract to furnish such reports. Oth-

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erwise, telegraph companies would be converted into public vehicles for the consummation of all kinds of illegal designs. *Smith v. Western U. Tele. Co.* (1887) 84 Ky 664, 2 SW 483, 485, 8 Ky Law Rep 672; *Western U. Tele. Co. v. State ex rel. Hammond Elevator Co.* (1905) 165 Ind 492, 76 NE 100, 108, 3 LRA(NS) 153, 6 Ann Cas 880; *Bryant v. Western U. Tele. Co.* (1883) 17 Fed 825; 1 Wyman, *Public Service Corporations*, §§ 590, 607, 613. Accordingly, after the Kentucky legislature passed an act making it a criminal offense to withhold the transmission or delivery of a telegraph or telephone message, the court of appeals of Kentucky observed: "It would be neither courteous nor fair to the legislative branch of the state government to impute to it, in construing one of its statutes, a purpose to encourage crime and foster immorality. . . . To hold that the statute being considered compelled the transmission of messages by the telegraph company, known to be designed for purposes of gambling within this commonwealth, would be to convict the legislature of favoring the vice of gambling. On the contrary, the true rule of interpretation is that the purpose of the legislature in passing such act will be presumed to be in harmony with the general public policy, evidenced by innumerable statutes against gambling in almost every conceivable form." *Louisville v. Wehmhoff* (1903) 116 Ky 812, 841, 76 SW 876, 884, 79 SW 201, 25 Ky Law Rep 995, 1924.

[9-11] The second contention of the appellant was that, since it had been publishing a daily sports sheet, the order of the Public Service Commission abridged the constitutional

privilege of freedom of the press. Freedom of speech and of the press are rights guaranteed by our fundamental law. The First Amendment guarantees the right against abridgment by Congress; the due process clause of the Fourteenth Amendment guarantees it against abridgment by any state. Article 40 of the Maryland Declaration of Rights declares that the liberty of the press ought to be inviolably preserved; that every citizen of the state ought to be allowed to speak, write and publish his sentiments on all subjects, being responsible for the abuse of that privilege. For many years after the invention of the printing press, the subjects in England were forbidden to publish any printed matter without the license of the government. It was to prevent any such interference that the American patriots incorporated these provisions in the Federal and state Constitutions. *Negley v. Farrow* (1882) 60 Md 158, 176, 45 Am Rep 715. The liberty of the press is a right belonging to everyone, whether the proprietor of a newspaper or not, to publish whatever he pleases without the interference of the government. Neither the Federal government nor the state can adopt any form of previous restraint upon printed publications or their circulation, or take any action which might prevent such free and general discussion of public matters as seems essential to prepare the people for an intelligent exercise of their rights as citizens. *Grosjean v. American Press Co.* (1936) 297 US 233, 249, 80 L ed 660, 668, 56 S Ct 444, 449.

In 1931 the Supreme Court of the United States held invalid an act of

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the Minnesota Legislature, Mason's Minn. St. 1927, § 10123-1, which sought to permit the issuance of an injunction against any business engaged in publishing "a malicious, scandalous, and defamatory newspaper, magazine, or other periodical." The court held that the statute imposed an unconstitutional restraint upon those who publish charges against public officials. Chief Justice Hughes declared in the opinion of the court: "The conception of the liberty of the press in this country had broadened with the exigencies of the colonial period and with the efforts to secure freedom from oppressive administration. That liberty was especially cherished for the immunity it afforded from previous restraint of the publication of censure of public officers and charges of official misconduct.

... The statute in question cannot be justified by reason of the fact that the publisher is permitted to show, before injunction issues, that the matter published is true and is published with good motives and for justifiable ends. If such a statute, authorizing suppression and injunction on such a basis, is constitutionally valid, it would be equally permissible for the legislature to provide that at any time the publisher of any newspaper could be ... required to produce proof of the truth of his publication, or of what he intended to publish and of his motives, or stand enjoined. If this can be done, the legislature may provide machinery for determining in the complete exercise of its discretion what are justifiable ends and restrain publication accordingly. And it would be but a step to a complete system of censorship." *Near v. Minnesota ex*

rel. Olson (1931) 283 US 697, 716, 721, 75 L ed 1357, 1368, 1370, 51 S Ct 625, 631, 633.

But the Minnesota act was an attempt on the part of the state to suppress publication; in the case at bar the appellant is attempting to compel another company to participate in its operations. It is obvious that the appellant has not been denied the privilege of expressing its opinion on any subject. It is an ancient doctrine of the common law that no court should lend its aid to enforce a contract to do an act that is illegal, or which is inconsistent with sound morals or public policy, or which tends to corrupt or contaminate by improper influences the integrity of our social or political institutions. *Marshall v. Baltimore & O. R. Co.* (1853) 16 How 314, 344, 14 L ed 953, 962. The state, in the exercise of the police power and in the interest of the public welfare, has the undoubted right to regulate and limit the right of contract. *Wight v. Baltimore & O. R. Co.* (1924) 146 Md 66, 75, 125 Atl 881, 37 ALR 864, 868; *Adair v. United States* (1908) 208 US 161, 172, 52 L ed 436, 441, 28 S Ct 277, 280, 13 Ann Cas 764.

[12-16] The appellant's third contention was that the court erred in striking out the evidence presented at the trial below and in refusing to send it to the Commission. The appellant offered to show that the Western Union has been furnishing special contract service of a similar type for other concerns. However, the evidence clearly shows that the appellant's business was to furnish news of such a nature and in such a manner that the recipients would be expected to use

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it for an illegal purpose. The appellant also offered to produce a witness to testify that when he visited the premises where the tickers were located subsequent to the hearing before the Commission, he saw no violation of the law. The statute provides that if at the trial the plaintiff shall introduce evidence which the court finds to be different from or additional to that offered before the Commission, the court shall transmit a copy of the evidence to the Commission and stay the proceedings for fifteen days from the date of the transmission. The Commission may thereupon modify or rescind its order, and shall report its action to the court within ten days from the receipt of the evidence. The judgment of the court is then rendered upon the amended order. Code, Art. 23, § 416.

In exceptional cases, where unusual changes occur subsequent to the hearing before the Commission beyond the control of the parties, the trial court is justified in transmitting to the Commission any evidence relating to the changed conditions. It has been decided by the supreme court of Indiana that, since the statute does not provide that the "different" or "additional" evidence shall relate only to matters existing prior to the decision of the Commission, evidence relating to matters occurring at any time up to the trial on appeal is unobjectionable. *Public Service Commission v. Frazee*, 188 Ind 573, PUR1919C 979, 122 NE 328. Thus, when an order of the Nebraska State Railway Commission was challenged as unreasonable on account of changed conditions due to war, the supreme court of Nebraska asserted: "The order was

made before the United States engaged in the present war. As a military measure the Federal government is now controlling defendant's railway system. The enforcement of the order challenged on appeal will require labor, materials, and money. Owing to the exigencies of war, the government is making extraordinary demands for funds, men, materials, and railroad equipment. . . . When the order was made there was no occasion or opportunity to present or consider these features of the questions presented by the appeal. . . . The Nebraska State Railway Commission should have an opportunity for further inquiry in view of changed conditions." *Ralston Business Men's Asso. v. Bush* (1918) 102 Neb 446, 167 NW 727.

However, on any appeal from an order of the Commission, the burden of proof is on the complainant to show that the order is unlawful or unreasonable "by clear and satisfactory evidence." Code, Art. 23, § 419. Manifestly, if the court finds that the evidence is not clear and satisfactory, it would be a perfunctory and frivolous proceeding to transmit the evidence to the Commission simply to have the Commission transmit it back again. Such a procedure would serve no useful purpose whenever the court determines in the first instance that the "different" or "additional" evidence does not alter the conclusion. To justify the court in remanding the case to the Commission, the evidence should be so substantial and sufficient that it might have the effect of making some change in the conclusion. The appeal to the court of chancery should not be used as a door through which the

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appellant can readily escape from his situation and thereby circumvent the work of the Commission. The adjudications of the Commission are prima facie correct, and the courts ascribe to them the strength due to judgments of a tribunal established by law and informed by experience. The court should not examine the facts in any case further than to determine whether there was substantial evidence to sustain the order. The findings of the Commission are subject to review, but when supported by evidence they are accepted as final. The court will not disturb a decision of the Commission unless it exceeded its jurisdiction or arbitrarily disregarded the rights of the parties. Public Service Com-

mission v. Northern C. R. Co. (1914) 122 Md 355, 391, 90 Atl 105, 118; Public Service Commission v. Byron, 153 Md 464, PUR1927E 286, 138 Atl 404, 410; Public Service Commission v. Williams (1934) 167 Md 316, 331, 173 Atl 259, 265; West v. Tidewater Express Lines (1935) 168 Md 581, 586, 179 Atl 176, 179; 3 Pond, Public Utilities, §§ 938, 939, 940.

As the Public Service Commission did not exceed its statutory power or act unreasonably in this case, and no reversible error was committed by the court in striking out the evidence offered at the trial, we affirm the decree dismissing the bill of complaint.

Decree affirmed, with costs.

FEDERAL COMMUNICATIONS COMMISSION

Re Telegraph Division Order No. 12

[T-9(a), Docket No. 2639.]

Rates, § 529 — Telegraph — Urgent messages — Value and cost of service.

1. The ratio between charges for urgent and for ordinary telegraph messages must be justified largely on the basis of the increased costs to the carriers in providing the higher grade of service, not on the basis of its value to any particular user, or, in effect, the charge which the user can be made to bear, p. 212.

Rates, § 529 — Telegraph — Urgent messages — Relationship to ordinary messages.

2. A 2 to 1 ratio between charges for urgent and for ordinary telegraph messages (urgent messages being given priority) was held not to be supported by the additional cost involved or justified by application of the value of service theory, and a reduction of the ratio to $1\frac{1}{2}$ to 1 was ordered, p. 213.

(CASE and THOMPSON, Commissioners, dissent.)

[April 9, 1941.]

I NVESTIGATION of ratio between charges for ordinary and urgent telegraph messages; reduction of ratio between charges ordered.

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APPEARANCES: Ralph H. Kimball, for the Western Union Telegraph Company; Manton Davis, Frank W. Wozencraft, and Chester H. Wiggin, for RCA Communications, Inc.; Louis G. Caldwell and Edward K. Wheeler, for International Communications Committee; John H. Wharton, for Commercial Cable Company; Beverly R. Myles, for Commercial Cable Staffs Association; and Frank B. Warren, for the Commission.

By the COMMISSION: On October 31, 1934, the Telegraph Division of this Commission issued its Order (No. 12), which instituted a general investigation into (1) the justness and reasonableness of the ratio between the charges for each class of telegraph communications and the basic charge for full-rate telegraph communications, and (2) the existence of (a) discriminations in charges, practices, classifications, regulations, facilities, or services for or in connection with like telegraph communication service, or (b) preferences or advantages to any particular person, class of persons or locality, or (c) prejudices against or disadvantages to any particular person, class of persons or locality with respect to telegraph communications, whether such discriminations, preferences, advantages, prejudices, or disadvantages are direct or indirect.

Extensive hearings were held beginning on March 4, 1935, and terminating on May 10, 1935. Among the numerous subjects affecting the telegraph industry on which evidence was adduced at these hearings was the matter of the justness and reasonableness of the ratio between the charges for urgent and ordinary messages in

the international service. An urgent plain language or urgent code (CDE) message is given priority over all other classes of messages, except government messages, in transmission and delivery, the sender of the urgent message writing the paid service indicator "URGENT" immediately before the address and paying double the charge for the ordinary (either plain language or code) message of the same length. Ninety per cent of the urgent traffic handled by the American carriers moves between New York and European points and 80 per cent of this traffic moves between New York and London.

The Western Union Telegraph Company (hereinafter referred to as Western Union), Commercial Cable Company (hereinafter referred to as Commercial Cables), and RCA Communications, Inc. (hereinafter referred to as RCAC), appeared at the hearings in support of the justness and reasonableness of the ratio between the charges for urgent and ordinary messages. The Cable and Radio Users Protective Committee, an association of users of telegraph service, urged a reduction in the ratio between the charges for urgent and ordinary messages. The International Communications Committee (hereinafter sometimes referred to as the "Committee") is the successor to the Cable and Radio Users Protective Committee. This Committee is an informal organization of 121 concerns consisting of 30 banks, 43 stock and commodity exchange houses, and 48 importers and manufacturing exporters. A majority are located in New York, but the membership includes concerns in most of the large cities of the Unit-

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ed States. These concerns provide more than 90 per cent of the urgent traffic handled by the American carriers.

On June 14, 1937, the Commission issued its report and order, holding that the existing ratio (2 to 1) between charges for urgent and ordinary messages was unjust and unreasonable and that the maintenance of such ratio resulted in an unjust and unreasonable discrimination in charges for and in connection with like communication services, and subjected the users of the urgent service to an undue and unreasonable prejudice and disadvantage. The order was directed to the Western Union only, and required that company to cease and desist "from charging, collecting, or receiving rates for urgent plain language and code messages which bear the ratio to the rates for ordinary plain language and code messages found in said report to be unjust and unreasonable." 4 FCC 258, 273.

On November 10, 1937, Western Union issued, and on November 12, 1937, it filed, its Supplement No. 17 to FCC Tariff No. 60, effective December 12, 1937. This supplement reduced the Western Union's participation in the charges for urgent telegrams from the United States to England, France, Belgium, and Holland from double to one and one-half times the ordinary rate and, with respect to all other countries, abandoned the urgent classification. By reason of the proceedings hereinafter described, Supplement No. 17 never became effective.

Part I of the order of June 14, 1937, *supra*, relating to the "artificial delays" imposed upon the handling,

transmission, or delivery of ordinary messages in the international service was not opposed and has become effective. Part II of the order relating to the ratio between the charges for urgent and ordinary messages is the subject matter of this proceeding.

On November 11, 1937, prior to the effective date of Part II of the aforementioned order, the Western Union filed with the Commission its motion praying that the hearing be reopened and that Part II of the order of June 14, 1937, be suspended pending further hearing. The motion of Western Union was joined in by Commercial Cables and RCAC. The Cable and Radio Users Protective Committee opposed the motion. The effective date of Part II of the order of June 14, 1937, was postponed from time to time and on October 7, 1938, the Commission issued an order reopening the investigation instituted by Order No. 12 of the Telegraph Division, dated October 31, 1934, in so far as it related to the reasonableness of the ratio between charges for ordinaries and urgents (except press urgents), and the existence of discriminations, prejudices, or disadvantages resulting from such ratio for the purpose of taking further testimony with leave to all parties in the proceedings in Docket No. 2639 to appear and offer evidence in the premises. The hearing provided for in the order dated October 7, 1938, commenced on May 8, 1939, and was concluded on May 24, 1939. Evidence on behalf of the carriers, the Committee and certain employee groups was submitted. A proposed report of the Commission was issued on June 5, 1940. Exceptions to the proposed report were filed by the Com-

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mittee. Briefs have been filed on behalf of the Committee and the respondents. Counsel for the Committee, the respondents, and the Commission were heard in oral argument on December 5, 1940.

It should be noted that Part II of the Commission's order of June 14, 1937, did not prescribe the ratio which should be made effective by the carrier named in that order. It merely held that the existing ratio (2 to 1) between the charges for urgent and ordinary messages results in unjust and unreasonable discrimination, and undue and unreasonable prejudice and disadvantage. It should also be noted that the Committee representing the users admits that the urgent service as furnished by the carriers, parties hereto, should bear a higher rate than that charged for ordinary service. The issue is thus narrowed to the question as to whether the differential based on the 2 to 1 ratio is justified, and if not, what the proper ratio should be.

The general nature of urgent service was described in our previous Report, 4 FCC 258 at p. 263. The Committee contends that the only additional service rendered by the carriers in furnishing urgent service, as distinguished from ordinary service, is the placing of the urgent message on top of the file for transmission ahead of other traffic. Urgent service is not used for all stock and commodity quotations and transactions between Europe and the United States for the reason that the ordinary service is sufficiently speedy for most purposes. The average speed of handling an ordinary message from the time of its receipt in the New York office of one of the carriers until it is transmitted

is one minute and four seconds. Many ordinary messages are transmitted by all companies in from one to three minutes after the time of filing. In the case of a large user of urgent service, the elapsed time between filing of an ordinary message in New York and delivery in London is not much over a minute more than the elapsed time for the handling of an urgent message between the same points. The users of urgent service receive a service which amounts to more than mere priority over ordinary service. This is clearly established from the record of special employees, equipment, and methods evolved to insure extremely expeditious handling of urgent messages. The user of urgent service also is required to make substantial expenditures by way of wages of special employees, etc., in order to insure that the urgent service shall be as expeditious as required in the type of business which avails itself of the urgent service. All the expenditures of the carriers and all the attention given to urgent service would not provide the type of service which the users require if the user does not cooperate fully in providing his own personnel to insure the speed desired in connection with this service.

The International Telegraph Regulations

Much evidence was presented with respect to action taken by various delegations and representatives at the International Telecommunications Conference at Madrid in 1932 and at Cairo in 1938. The ratio of 2 to 1, urgent to ordinary, was adopted at Madrid in 1932, made effective by the American carriers in 1934, and af-

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firmed at Cairo in 1938, although representations were made at the later conference by the countries between which the service is principally used (Great Britain and the United States) for a reduction in this ratio. The United States Government is not a party to the International Telegraph Regulations and neither are any of the carriers respondents in this proceeding. Since the International Telegraph Regulations are not binding on either the carriers or the United States Government, they do not offer any obstacle to the prescription by this Commission of a different ratio, urgent to ordinary, than that set forth in those regulations. The bulk of the urgent traffic, which moves between New York and London, was for years handled under a classification called "preferred service" and at a rate which was $1\frac{1}{2}$ times the ordinary rate. The International Telegraph Regulations at that time did not prescribe the classification above referred to as "preferred," but provided for a somewhat similar expedited service called "urgent" service at triple the ordinary rates. Notwithstanding this situation, the United States cable carriers in the transatlantic field handled traffic as "preferred" as far as London and beyond there the European carriers handled it to destination as "urgent," which conclusively establishes that the United States carriers, as a practical matter, are not required to adhere to the classifications and rates prescribed in the International Telegraph Regulations.

Cost of Furnishing Urgent Service

The hearing in this matter was reopened by the Commission upon the

petition of Western Union, supported by the other carriers, in order to give the carriers an opportunity to submit evidence particularly upon the cost of furnishing urgent service. While they offered some evidence upon cost it has little if any probative value and fails to convince that the existing ratio of charges is supported by the ratio of costs.

At the reopened hearing each of the carriers submitted studies purporting to show the cost of handling urgent traffic. The Western Union study is based on its operations on November 15, 1938, which was assumed to be a typical day. On this day it found that fifteen of its available twenty-two North Atlantic channels were assigned to and did actually handle some urgent traffic, nine channels being used for eastward traffic and six for westward traffic. Between the hours of 10 and 11 A. M., the peak hour for urgent traffic, 23.9 per cent of the total words handled on the fifteen channels referred to was urgent traffic. The carrying charges related to the twenty-two channels were estimated to be \$3,456,468 for the year 1938. The items included in "carrying charges" are generally expense items which are fixed and do not fluctuate with the volume of business. Twenty-three and nine-tenths per cent of 15/22 of the above annual carrying charges on all the North Atlantic cables was assumed to be assignable to urgent traffic. The amount thus determined is \$563,247 per year.

We cannot perceive what value this study has to the present proceeding. The problem is not one of establishing an appropriate charge for urgent service, considered alone, to be derived by

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some scheme or percentage basis of allocating facilities used jointly by urgent and other types of service. For purposes of this proceeding, the propriety of the charges for ordinary messages has been by everyone assumed. The sole problem is, given this premise, are the increased costs sustained by the company in furnishing the urgent service and the resulting effects upon this and other services sufficient to justify the present ratio of charges. No attempt was made in this study to determine what facilities or what elements of cost in relation to those facilities could have been eliminated were urgent service abolished.

There is nothing in this study which tended to establish that adoption of the urgent classification involved maintenance of more channels than would otherwise be necessary. Indeed one of its studies tends to establish the converse. This study determined that on May 17, 1939, between the hours of 10 and 11 A. M., 171 urgent messages were handled in comparison with approximately 400 urgent messages between the same hours on November 15, 1938. The May 17, 1939, study indicated that of the nine channels assigned for eastward urgents, a maximum of five were in use during any one-minute period for handling urgent traffic; a maximum of six were in use during any 5-minute period; and a maximum of eight were in use during any 10-minute period. At no time during the hour were all nine eastward channels in use for handling urgent traffic. If at no single moment were all channels utilized for urgent messages, then obviously it could not be claimed that certain of the channels were necessary solely in order to main-

tain the established speed in transmitting messages of this classification. There is nothing anywhere in the record to indicate satisfactorily that some portion of the carrying charges on the cable plant should be assigned to urgent service as a "standby" or "readiness-to-serve" charge.

Another study submitted by the Western Union dealt with the issue. It purported to show that in the absence of urgent traffic four of the twenty-two North Atlantic channels could be eliminated. On this basis the plant expense for handling urgent traffic was assumed to be 4/22 of \$3,456,468, or \$628,448 per annum. But there is nothing in the study to justify the conclusion that four channels could be eliminated without degrading the ordinary service. And there is every reason to believe that this could not be done. Certainly, the Western Union has no intention of abandoning any part of its plant if urgent service is discontinued, in the absence of some other change which would justify such abandonment. Nor is it shown that any particular plant was constructed solely on account of urgent service. The public generally is entitled to expeditious service and undoubtedly will demand continuance of the transmission of ordinary messages at the same speed as has heretofore prevailed. Furthermore, competition among the carriers will alone compel a degree of service which would make it impossible to discard existing channels.

Apart from the problem of the carrying charges on plant assumed to be allocable to urgent traffic, it was estimated that if urgent traffic were abandoned the Western Union could dis-

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pense with the services of a total of 111 cable operators, supervisors, routing aides, service clerks, customer tie-line operators, etc., at a saving in labor costs of \$213,240 per annum. In addition, witnesses for Western Union stated that special equipment provided solely for handling urgent traffic involved carrying charges of \$58,000 per annum and, further, that certain land lines in Great Britain could be released if urgent traffic were eliminated, which would result in a saving of approximately \$24,000 per year. It was also stated that urgent traffic is one of the major reasons why the Western Union has been unable to transfer its cable operating room from 40 Broad street, New York, to the main office at 60 Hudson street, and that such a transfer of operations would result in an annual saving to the company of \$200,000. Other expenses partly attributable to the handling of urgent traffic were said to be the salaries of engineers who devote part of their time to the urgent service and the expense of maintaining branch offices at Shorter's Court, London, and the cotton exchanges at New York and Liverpool.

But it is nowhere made clear to what extent expenses of this type could be eliminated on abolition of urgent service. And it certainly appeared that elimination of the 111 employees could be effected only at a sacrifice of the existing quality of ordinary service. Herein lies the vice of all the studies of this character made by the company. All the cost elements which tend to expedite service were too readily assumed to be attributed to urgent service. Nowhere did they clearly make the assumption that users of or-

dinary service are entitled to substantially their present quality of service and on that basis proceed to determine what extra expenses were involved in furnishing the premium service. While there are unquestioned incremental expenses involved in the latter, the over-all record fails decidedly to establish them sufficient in degree to justify the existing 2-1 ratio.

The cost studies submitted by the other two carriers can be dismissed briefly. It should, however, be noted that they did not attempt, as did Western Union, to justify the present ratio on a plant allocation basis, but correctly endeavored to establish incremental costs resulting from offering the premium service. The study by Commercial Cable Company assumed that if no urgent traffic were handled, it would be able to discontinue its branch offices at Shorter's Court, and at the cotton exchanges in New York and Liverpool, with a total saving in office rentals, leased wire expenses, and wages of approximately \$50,000 per year. It was further assumed that if the urgent classification were abandoned it could dispense with the services of cable operators, supervisors, messengers, tie-line operators, clerks, etc., at its terminal offices in New York, London, and Paris, with a total saving to the company of approximately \$72,000 per year. In addition, it was assumed that the company would be relieved of the necessity of paying approximately \$6,000 in transit taxes to the Portuguese authorities at the Azores for the passage of urgent traffic through this point.

It is apparent that if the three branch offices of Commercial Cables above referred to were to be aban-

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done, some other provision would have to be made for handling the traffic now handled at these offices. The estimated saving of \$50,000 would therefore be reduced by the undetermined expense of some other method of handling the traffic now handled through these offices. As in the case of Western Union, it is apparent that additional operating expenses are incurred for handling urgent traffic, but it is impossible to determine with any reasonable degree of accuracy the amount of such additional operating costs.

RCAC based its cost study on the expenses which it estimated could be eliminated in its main operating room at 66 Broad street, New York, if the urgent service were not offered. It was estimated that a total of nineteen employees, assigned primarily to the handling of urgent traffic with total annual salaries of \$37,352, could be eliminated. It was also estimated that 50 tie-lines now furnished to the urgent users could be eliminated with an annual saving of \$3,784. The evidence submitted by RCAC affords no basis for an exact determination of the expense which would be eliminated if urgent traffic were not handled. It is apparent, however, that patrons of RCAC would object strenuously to the withdrawal of many of the 50 tie-lines which it assumed might be eliminated, since these tie-lines are used for services other than urgent traffic.

The record establishes that nothing more than the costs associated with certain employees and tie-line facilities at the terminals of the carriers are solely attributable to urgent traffic. It is clear that if all the employees and facilities involved were to be eliminat-

ed, there would be a substantial degrading of the ordinary service, at least during the busy hours. The carriers do not contend that ordinary service is above the standards to which the public is reasonably entitled, and it is a fair assumption that a degraded ordinary service due to the elimination of tie-line facilities and operating personnel, would not adequately meet the public requirements with regard to ordinary service. If consideration is given to the employees and facilities in the New York offices which would have to be retained in any event to avoid an unreasonable degradation of the ordinary service, it is apparent that the premium from urgent service is far in excess of any costs solely attributable thereto. It is also apparent that a reduction in the ratio from 2 to 1 to $1\frac{1}{2}$ to 1 would not result in a situation where the revenue from the premium on urgent service would be less than the cost solely attributable to the quality of urgency.

Benefits and Value of Service

[1] The Western Union position in the first hearing, as stated by its counsel, was, in effect, that the cost element in furnishing urgent service was given entirely too much weight and consideration, and that the ratio between the charges for urgent and ordinary messages (2 to 1) represents an effort on the part of the carriers to fix a rate which will confine the use of urgent service to the people who have a real need for such service, and to prevent its use becoming so general as to destroy the benefit of that service for the persons who really have need for it.

Urgent service may well be of very

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substantial value to the parties who have occasion to use it. Indeed, there is some testimony by the members of the Committee indicating that in particular instances resort would be had to the urgent classification rather than the ordinary classification irrespective of the ratio of the charges within reasonable limits. This the carriers seek to stress in justification of the existing ratio. But the point is of very limited significance. The ratio must be justified largely on the basis of the increased costs to the carriers in providing the higher grade of service; not on the basis of its value to any particular user, or in effect, the charge which the user can be made to bear.

"Value of service" has significance in the adjustment of rates in a matter of this kind only in considering the over-all effect of the rate upon the service in question and upon other services offered by the carrier, i. e., whether a proposed rate for a classification of service would increase or decrease the benefit of that particular service or of other services to the telegraph-using public. It may well be anticipated that a reduction in the urgent rates will increase the volume of traffic moving under that classification, but there is nothing to indicate that such an increase in volume will degrade the quality of urgent service or the quality of service rendered under the ordinary classification. There is nothing in the record to indicate that the double rate now in effect is justified upon any "value of service" standpoint, but on the contrary, it is apparent that a reduction of the 2 to 1 ratio will increase the benefit of the urgent service to all users who have a

need for that service without degrading the benefit of the other services.

Unreasonableness of Ratio

[2] Despite the opportunity afforded by the reopened hearing the carriers have failed to justify the continuance of the 2 to 1 ratio with respect to urgent traffic on a basis of additional cost incurred in supplying this type of service. By comparison with the ordinary service, the additional cost involved in supplying urgent service does not appear to justify the 2 to 1 ratio for the future. Nor is the maintenance of the 2 to 1 ratio justified by the application of the "value of service" theory largely relied upon by counsel for Western Union. There is nothing in the record to indicate that a reasonable reduction in the basis for urgent charges would result in so increasing the traffic and thereby degrading the several services as to degrade the value of those services for the persons who really have need for them. On the contrary, the record does show that the maintenance of the existing 2 to 1 ratio has prevented the use of urgent service by certain persons who do have a real need for the service.

The Committee takes the position that the issue here is whether the carriers can justify what they term an increase in the ratio, urgent to ordinary, made effective in 1934. We do not agree with this contention. At the time this investigation was instituted, on this Commission's own motion, the legal ratio, included in tariffs filed with this Commission, was 2 to 1; and the proceeding is not one in which the carriers are called upon to justify an increase in existing rates. It is rather

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one where the Commission upon its own motion seeks to determine whether the existing charges are just and reasonable for the future or in any way violative of the provisions of the Communications Act. Our conclusion is that for the future the basis for urgent charges should be reduced.

Conclusion

The cost studies in this proceeding do not afford a basis for a mathematical determination of an appropriate ratio of charges for urgent messages as compared to ordinary messages. However, giving due consideration to the cost studies and to the other evidence in the record, the Commission concludes that the ratio should be reduced from 2 to 1 to $1\frac{1}{2}$ to 1. Certain of the carriers in this proceeding maintained, prior to 1934, a classification of service known as "preferred." It is indicated that the "preferred" service was somewhat comparable to that now classified as "urgent." The "preferred" service was charged for on a basis, voluntarily fixed by the carriers of $1\frac{1}{4}$ times the rate for ordinary service. There is no indication that the $1\frac{1}{4}$ to 1 ratio was inadequate or that it resulted in so degrading the "preferred" service as to destroy its value to users requiring extreme expedition. The tariff of the respondent Western Union Telegraph Company (Supplement No. 17 to FCC Tariff No. 60) filed with the Commission on November 12, 1937, pursuant to the Commission's report and order heretofore referred to, fixed the ratio for urgent messages at $1\frac{1}{2}$ to 1 over its own lines, which is indicative of the fact that that carrier was of the opinion that this ratio was proper. Counsel for the

users stated in oral argument that a ratio of $1\frac{1}{2}$ to 1 would be proper from the standpoint of the users.

The Commission has given consideration to the motion of the Radio Corporation of America Communications, Inc., for further argument in this matter and considers that motion to be without merit. This has been a long proceeding and the parties have had every opportunity to bring in facts in their possession bearing upon the issues.

An appropriate order will be entered.

CASE, Commissioner, dissenting: I am unable to join in the adoption of the order of the Commission requiring a reduction in the ratio between the charges for ordinary and urgent telegraph traffic.

The majority decision properly reaches the conclusion that "it is impossible to determine with any reasonable degree of accuracy the amount of such additional costs." The additional operating costs referred to are costs solely attributable to the quality of urgency present with regard to traffic moving under the urgent rate. It necessarily follows that there is no foundation for the further conclusion of the majority "that a reduction in the ratio from 2 to 1 to $1\frac{1}{2}$ to 1 would not result in a situation where the revenue from the premium on urgent service would be less than the cost solely attributable to the quality of urgency." The two conclusions are absolutely irreconcilable. There is likewise no foundation in the record and no support from any other source for the conclusion of the majority to the effect that a reduction of the 2 to 1 ratio would increase the value of the urgent

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service to all users. The value of the service to a user depends upon the nature of his business and his necessities in this regard. Changing the basis of charges for communication service cannot possibly affect the value of the service to the user, although it may make the service available to additional users and increase the use of existing users. The three conclusions referred to above seem to be the basis upon which the majority considers the reduction justified. None of them are supported by the record. Furthermore, there is a fundamental principle of rate making here involved which is conclusive against a reduction in the urgent rate on the basis of the record before us. Persons who demand premium services should pay premium prices in order that the vast majority of users may receive their services at the lowest possible rates. The urgent service is of inestimable value to the limited number of users who demand it. Urgent service is an absolute essential to the operations of the arbitragers. In the absence of this class of user it is doubtful whether urgent service would ever have been established. Seven users of one carrier take more than 79 per cent of the urgent service. One hundred twenty-one represent 90 per cent of all the users of urgent service. The record is devoid of positive evidence that the existing 2 to 1 ratio has operated to restrict the use of urgent service. It is likewise devoid of positive evidence that a reduction in the ratio will result in an increase in the use of urgent service. The use of urgent service depends primarily upon the activity in security markets. If the markets are

inactive, there is no need for urgent service and no matter what the rate the use would be extremely limited.

There is for all practical purposes no urgent traffic moving today. The majority reaches the conclusion that reparation as to traffic handled in the past is not justified upon this record. There are certain practical difficulties in connection with the application of the ratio ordered by the majority particularly in the case of radio carrier where one terminal of the circuit is in a foreign country and owned by a foreign administration. Bearing in mind that the International Telegraph Regulations provide for uniform application of the 2 to 1 ratio condemned by the majority, the practical aspects of the problem indicate the difficulties of securing international agreement for reduction by the U. S. companies concerned and the undesirability of ordering any adjustment at this time.

As the majority points out, the users' committee takes the position that the issue is whether the carriers can justify what the users term an increase in the rate made effective in 1934. The majority denies that this is the issue. Further, statistics relating to the average cost of urgent messages show clearly that the average cost per urgent message was less in 1938 than in 1926. It is thus clear that there is no foundation for an adjustment in the ratio based upon the contention of the users.

I agree with the conclusion in the *proposed* report that the record before us does not provide a satisfactory basis for disapproval of the existing ratio of 2 to 1 urgent to ordinary, at this time.

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Re Fluorescent or Other Lighting Equipment

[Docket No. 3336, Report and Order No. 1763.]

Service, § 327 — Electricity — Fluorescent lighting equipment — Rule.

An electric utility company should be permitted to adopt a rule against the furnishing of service to any fluorescent or other lighting equipment having similar load characteristics unless such equipment is constructed to operate at a power factor of 90 per cent lagging or more.

[January 25, 1941.]

INVESTIGATION of rule relating to electric service for fluorescent or other lighting equipment; rule approved.

APPEARANCES: H. H. Cochrane, Chief Engineer, Montana Power Company, Butte; R. E. McDonough, Assistant General Sales Manager, Montana Power Company, Butte; J. E. Corette, Jr., Counsel, Montana Power Company, Butte; M. M. Rawlings, Mountain States Power Company, Kalispell; M. P. Trenne, Montana Auto Dealers Association and Montana Implement and Hardware Association, Helena; H. McCullough, Tobacco River Power Company, Eureka; Don A. Pearson, General Electric Co., Lamp Department, Butte; A. P. McDonald, Montana-Dakota Utilities Company, Minneapolis; D. H. Steeves, Lighting Supervisor, Montana-Dakota Utilities Company, Glendive; J. R. Kaiserman, Division Manager, Montana Power Company, Helena; R. O. McPhillips, Superintendent, Great Northern Utilities Company, Shelby; H. M. Saubert, Manager, Great Northern Utilities Company, Shelby; H. W. Hafer, City Light Company, Winnett; J. L. Lori-

mer, General Electric Company, Butte; E. G. Toomey, for Montana-Dakota Utilities Company, Helena; Enor K. Matson, Counsel, Public Service Commission, Helena.

By the COMMISSION: The Commission ordered a public hearing to be held to determine the reasonableness of a ruling by the Montana-Dakota Utilities Company reading as follows: "The company shall refuse electric service to any fluorescent or other lighting equipment having similar load characteristics installed after September 1, 1940, unless such equipment is constructed to operate at a power factor of 90 per cent lagging or more." The matter was duly set for hearing at the offices of the Public Service Commission of the state of Montana in the Capitol building, at Helena, Montana, on January 15, 1941, and proper notice was given to all the electric utilities in the state by mailing notice of said hearing to each of the said electric utilities and to the com-

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numers of electrical current and to the public by publication of the notice in various daily and other newspapers throughout the state of Montana as provided by the rules and regulations of the Commission. At the hearing evidence was submitted by the Montana-Dakota Utilities Company and others. At the close of the evidence the matter was submitted and taken under advisement by the Commission.

Findings of Fact

The Commission finds:

(1) That the use of high power factor equipment for fluorescent and other tube type of lamps will assist in protecting the consumer from the fire hazard of over-loaded circuits.

(2) That the use of high power factor equipment will decrease the cost of operation to the consumer of fluorescent and other tube type of lamps and will not increase the cost of operation of incandescent lamps.

(3) That the use of high power factor equipment in decreasing voltage fluctuation will give better service to the consumer.

(4) That the use of low power factor equipment, if permitted, will cause serious disturbances to the quality of service rendered in the smaller communities particularly.

(5) That the use of high power factor equipment for such type of lighting avoids the cost of utilizing the larger conductors to carry idle current.

(6) That the difference in first costs between the low and the high power factor equipment or type of fixtures is comparatively small, and requiring the consumer to use the

high power factor equipment will not cause an undue burden to fall upon him.

(7) That the use of high power factor equipment by the consumer will result in mutual advantage to both consumer and the utility.

(8) That the said ruling of the Montana-Dakota Utilities Company is reasonable.

Conclusions of Law

The Commission concludes:

(1) The proposed ruling of the Montana-Dakota Utilities Company is reasonable and should be approved by the Commission.

(2) That all other utilities furnishing electric service in the state of Montana should be permitted to issue a similar rule.

ORDER

Now, therefore, at a session of the Public Service Commission of the state of Montana, held at its offices in the Capitol building, Helena, Montana, on January 25, 1941, there being present Austin B. Middleton, Chairman, Commissioner Horace F. Casey and Commissioner Paul T. Smith, there regularly came before the Commission for final action the matters and things involved in Docket No. 3336; and it appearing that the Commission has this day issued its report, findings of fact and conclusions of law, which are hereby referred to and of this order made a part, and all the matters and things involved having been fully investigated and public hearing had whereat all persons interested had an opportunity to appear and pre-

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sent their respective interests; and the Commission now being fully advised in the premises;

It is *ordered* that the ruling of the Montana-Dakota Utilities Company as hereinbefore set forth, be, and the same is hereby approved; that there be added to the rules and regulations, Prescribed Standards for Electric Service, the following:

Rule 33

Appliances

(a) Lighting equipment

Any public utility under the jurisdiction of the Public Service Commission of the state of Montana may refuse electric service to any lighting equipment unless such equipment is constructed to operate at the power factor of 90 per cent lagging or more.

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Board of Railroad Commissioners et al. v. Gamble-Robinson Company et al.

[No. 8106.]

(— Mont —, 111 P(2d) 306.)

Public utilities, § 38 — What constitutes — Transportation for own benefit.

Businessmen who operate their own motor vehicles for the delivery of their own goods purely as an incident to their regular business and do not compete with those engaged in the transportation business for the transportation of the property of others, are not motor carriers for hire within the meaning of the statute defining and regulating motor carriers.

(ANGSTMAN, J., dissents.)

[February 18, 1941. Rehearing denied March 18, 1941.]

APPPEAL from order denying injunction in action to restrain defendant from transporting property for hire without a certificate; affirmed.

APPEARANCES: H. J. Freebourn and J. W. Brown, both of Helena, Geo. S. Smith, of Billings, and E. K. Matson, of Helena, for appellants; Johnston, Coleman & Jameson, of Billings, for respondents.

JOHNSON, C. J.: This is an appeal from an order denying plaintiffs' prayers for temporary injunctions

after a hearing upon orders to show cause in three separate suits against Gamble-Robinson Company, Keel Company, and Ryan Grocery Company which were combined by agreement of the parties. The actions are practically identical upon the pleadings, and also upon the evidence except as hereinafter stated.

The suit was brought under Chap

§10 of the Political Code of Montana (§§ 3847.1 to 3847.28, Rev. Codes), which was originally enacted as Chap. 184 of the 1931 Session Laws, for the supervision and regulation of motor carriers by the state Board of Railroad Commissioners.

Section 3847.1, subdivision (h), defines the term "motor carrier" as any person or corporation "operating motor vehicles upon any public highway in the state of Montana for the transportation of persons and/or property for hire, on a commercial basis either as a common carrier or under private contract, agreement, charter, or undertaking" with certain exceptions not material here.

Section 3847.1, subdivision (i), provides: "The words 'for hire' mean for remuneration of any kind, paid or promised, either directly or indirectly. An occasional accommodative transportation service by a person not in the transportation business, shall not be construed as a service for hire, even though the person transported shares in the cost or pays for the service."

Section 3847.2 makes it unlawful for any person or corporation "to operate any motor vehicle for the transportation of persons and/or property for hire on any public highway," road or street within the state except in accordance with the act, and divides motor carriers into three classes, the last of which it defines as follows: "Class C motor carriers shall embrace all motor carriers operating motor vehicles for distributing, delivering, or collecting wares, merchandise, or commodities, or transporting persons, where the remuneration is fixed in and the transportation service furnished un-

der a contract, charter, agreement, or undertaking."

Section 3847.3 empowers the Board of Railroad Commissioners to supervise and regulate all motor carriers in the state, and § 3847.10 provides that no Class C motor carrier "shall hereafter operate for the distribution, delivery, or collection of goods, wares, merchandise, or commodities, or for the transportation of persons on any public highway in this state, without first having obtained from the Board, under the provisions of this act, a certificate that public convenience and necessity require such operation."

Section 3847.11 provides that upon application for such a certificate notice shall be given and all interested parties heard for or against the same, and that if "the Board shall find, from the evidence, that public convenience and necessity require the authorization of the service proposed, or any part thereof as the Board shall determine," consideration being given the present transportation facilities, the apparent permanence of the proposed service, etc., it shall issue a certificate therefor. This section also provides that an application by a Class C carrier "may be disallowed without a public hearing thereon when it appears from the records of the Board that the route or territory sought to be served by the applicant has previously been made the basis of a public investigation and finding by the Board that public convenience and necessity do not require such proposed motor carrier service unless it is made to affirmatively appear in the application by a recital of the facts that conditions obtaining over said route or in said territory and affecting transportation facilities therein

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have materially changed since said public investigation and finding and that public convenience and necessity do now require such motor carrier operation."

In each action plaintiffs sought an injunction restraining the defendant from operating motor vehicles upon any public highway, road, or street in the state for the transportation of property for hire on a commercial basis, either as a common carrier or under private contract, charter, agreement, or undertaking, without procuring from plaintiffs a certificate of public convenience and necessity.

The complaints originally alleged that each defendant was "transporting property belonging to third persons for hire on a commercial basis, as a common carrier or under private contract," etc., but at the trial each was amended to eliminate the reference to the property of third persons, and to allege that the defendant "is transporting property belonging to said [defendant] for hire," etc. The answers placed in issue the contention that the defendants were motor carriers within the meaning of the act.

The evidence shows that each of the three defendants is a wholesaler or jobber selling grocery and fruits in Billings and the territory tributary thereto, that the business is highly competitive and of a close margin, and that each maintains its own trucks for the delivery of its merchandise to customers at Billings and outlying cities and towns, some of them one hundred or more miles from Billings; that each defendant's motor vehicle deliveries are purely incidental to its wholesale business and that none of them is engaged in the business of

hauling property for others or is competing for such business with those engaged therein; that none of the defendants has procured or applied to the plaintiffs for a certificate of convenience and necessity.

During the months of March and April, 1939, the Billings branch of Gamble-Robinson Company had followed the system of adding a small "Sales and Service" or "S. and S." charge not constituting purely freight or transportation charge but covering in part the expenses incidental to out-of-town sales, including general trucking, packing and night crew costs. About May 1st and before any intimation of suit the practice was discontinued by the Billings branch of Gamble-Robinson because it had proved unsatisfactory to both the defendant and its customers; but it was stipulated at the trial that the practice "is or may be continued by Gamble-Robinson Company in or at all other branch houses in the state of Montana."

The evidence shows that since the discontinuance of the special "S. and S." charge the transportation service and other expense formerly included therein has been absorbed by the general expense of doing business; that it is not possible to add delivery charges to the bills because prices are affected by competition not only with other firms at Billings but with firms at Red Lodge, Miles City, Roundup, Bozeman, and Livingston, Montana, and at Sheridan and Casper, Wyoming; that the prices do not vary with the trucking expense nor with the distance from Billings because the competition does not permit; that in some cases the prices at outside points are

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the same as or lower than the Billings prices; that it is impossible to add the freight charges to the specific shipments directly or indirectly, but that they must be absorbed as part of the general expense if the defendant is to remain in business.

With regard to the defendant Keil Company, the evidence shows that prior to May 1, 1939, it made specific charges on invoices, such as "plus 20 cents cwt \$.33," "plus 25 cents cwt dely chge \$1.98," but that about that time it eliminated such special charges; that to compete with jobbers from other cities it is necessary to quote prices for goods delivered to the purchaser and that the truck expense is and must be covered by increasing the sales price margins to the extent permitted by competition.

With reference to the Ryan Grocery Company, the evidence shows that prior to May 1, 1939, it made a delivery or handling charge which was based on tonnage but not on distance and was therefore the same for deliveries at Columbus as at Livingston, Hardin, or Pompey's Pillar; that it was estimated to cover so far as possible the expense of out-of-town sales, including increased sales and night crew expenses and also trucking and handling charges; it appeared on some of the invoices as "plus sales and service ex." That system was never possible at all points because of competitive conditions, and had been abandoned prior to suit and all expenses included in general business expense. The prices do not directly reflect delivery costs and in some cases, due to competition from other points, are lower at outside towns than at Billings.

The deliveries of goods by each de-

fendant have in all cases been purely incidental to its wholesale business. It seems clear from the testimony that none of the defendants ever made a specific charge for delivering the goods sold by it, but that each made charges tending to cover in some measure all the various items of additional expense occasioned by out-of-town sales and delivery. In no case was it shown that the charge for goods delivered in other towns was the Billings price plus transportation cost, or that the charge covered the transportation cost.

All of the defendants had discontinued making these special charges prior to suit and have expressed no intention of resuming them except as perhaps suggested by the stipulation of Gamble-Robinson Company mentioned above. What difference this makes would seem doubtful since, as we have pointed out above, none of the charges was shown to be adequate to cover transportation costs, or amounted to a direct charge for that purpose, or excluded other features than transportation. The most that can be said is that the charge represented some part of the transportation cost, and that the remainder of that cost was at all times absorbed in the general expense of doing business and was therefore paid indirectly by all of each defendant's customers. The only effect of the change prior to suit was the elimination of the direct payment of any part of the transportation cost, so that its entire payment became indirect.

Since the statute defines "for hire" as remuneration paid "either directly or indirectly," it can make little difference whether all of the transportation expense was paid directly, which

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the evidence does not show has ever been done by any customer of a defendant here; or whether it was all paid indirectly by the customers as part of a defendant's business expense; or whether it was paid by a combination of the direct and indirect methods. Obviously the transportation expense has to be paid somehow if the defendants are to stay in business, and the only normal source of payment is the money received from customers.

Whether or not the cost of the transportation was paid directly, indirectly, or partly in one way and partly in the other, the question here is whether a businessman, a farmer, or anyone else comes within the statute who operates a motor vehicle for the delivery of his own merchandise or produce purely as an incident to his regular business and does not compete for the transportation of the persons and property of others, with those engaged in the transportation business.

Thus the question is whether in enacting the statute the legislature meant merely to supervise and regulate those engaged in the business of transporting persons and property for hire, or also to supervise and regulate all those engaged in other businesses and using motor vehicles purely for the incidental purpose of delivering their own goods in the course of such businesses. The former would seem to be the clear intent, since the title of the act expressed an intention to supervise, regulate, and control "Motor Carriers Engaged in the Transportation by Motor Vehicles of Persons and Property for Hire" etc. "To engage" is "to embark in a business." Webster's New International Dic-

tionary, Merriam Webster, 2d Ed. The defendants are engaged in wholesaling just as ranchers are engaged in ranching. They are not ordinarily understood to be "engaged in" every occupation or activity purely incidental to their business. One engaged in either of those businesses and using motor vehicles for purposes incidental thereto cannot properly be said to be engaged in the transportation of goods, and the title of the act cannot logically be said to have given notice to the public or legislature of an intent to regulate their use of the highways. The attempt to ignore the self-evident limits of the title and to construe the act as contended for by plaintiffs here is met squarely by the provision of § 23 of Art. V of the state Constitution that "If any subject shall be embraced in any act which shall not be expressed in the title, such act shall be void . . . as to so much thereof as shall not be so expressed." The same result was declared in *People v. Montgomery* (1933) 92 Colo 201, 19 P (2d) 205, 206, where it was expressly attempted to include persons carrying their own property but the title of the act was limited to the use of motor vehicles "in the business of transporting persons or property" for hire.

If there were any possibility that by "engaged in transportation" the legislature meant "engaged in farming, wholesaling or other business or profession and transporting property in connection therewith," it is entirely dispelled by the provisions of the act itself. Several things in the act negative such intention, such as the reference to "business" and "service" in §§ 3847.1 and 3847.11, and especially the requirement of a certificate of pub-

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lic convenience and necessity, the issuance of which plaintiffs may in their discretion grant or refuse. It is conceivable that the legislature might wish to regulate this incidental use of the streets and highways by businessmen, workmen, and farmers, but it is not conceivable that it would attempt to do so by requiring them to obtain such certificate of convenience and necessity from the plaintiffs under provisions like those of § 3847.11. Certainly it would constitute bureaucracy run riot to permit an administrative board to put out of business a person using streets and highways as a necessary incident to his occupation, by deciding that the public convenience and necessity did not justify granting him such certificate. Without considering the constitutionality of such a measure, it is incredible to us that the legislature could have intended such a result, even if it were within the title of the act. We must conclude, therefore, that the title of the act expresses the exact meaning intended and that the legislative intent was merely to regulate those engaged in the business of transporting persons and property for hire.

Plaintiffs rely upon the statutory definitions in subdivision (i) of § 3847.1 that "the words 'for hire' mean for remuneration of any kind, paid or promised, either directly or indirectly," and in subdivision (h) of that section that "motor carrier" means every person or corporation operating motor vehicles on the highways "for the transportation of persons and/or property for hire," etc. The argument is that the defendants do receive remuneration for the transportation "directly or indirectly," and that they

come within the above definition of carrier, since they operate trucks to transport property, even though they are not engaged in the motor carrier business and carry their own property only as an incident to the business in which they are engaged. Even if such an intent were expressed by the title of the act, the contention could not be sustained.

It is well settled that a person who transports merely himself or his own property is not a carrier, and that by defining a carrier as one operating motor vehicles for the transportation of "persons and/or property" the legislature must have meant "other persons and/or the property of others." A person may be compensated directly or indirectly for transporting his own property, as the defendants have been in this instance. He may also be compensated directly or indirectly for transporting his own person, as is the doctor or the carpenter, plumber, or tinsmith who conveys himself by motor vehicle to perform work at the premises of others. Their charges must necessarily defray their transportation expense, directly or indirectly. In such case they might strictly be claimed to be motor carriers within the terms of the act because they are operating motor vehicles for the transportation of their own persons; but no one would seriously make such contention, because it would not be reasonable. Certainly no one would criticize reading the word "other" into the definition in that connection, for no other meaning could have been intended, unless everyone who conveys himself to work by a motor vehicle is within the definition and must obtain a certificate of public convenience and

MONTANA SUPREME COURT

necessity from the Board of Railroad Commissioners. But it is no less inevitable that the same concept be read into the other half of the expression "persons and/or property." Certainly the doctor, carpenter, plumber, or tin-smith, who could not logically be considered a carrier for transporting his own person, would not be brought within the definition because he carried his own instruments, tools, and equipment; nor can the farmer who carries his own produce to market, or the wholesaler, jobber, or retail grocer, who delivers his own merchandise in the regular conduct of his business. It would do violence to reason to construe a definition of motor carrier so as to include one's own person or property.

A leading decision so holding is *Holmes v. Railroad Commission* (1925) 197 Cal 627, PUR1926C 664, 674, 242 Pac 486, 490, in which the court said: "One who transports merely his own freight over the highway is not a carrier, private, or otherwise. He may be a farmer or a manufacturer or a merchant or what not, but the business in which he is engaged is not the business of transportation. He is not a carrier unless he engages in the business of transportation of the persons or property of others for compensation. One, who transports merely his own goods, is of necessity engaged in some business other than transportation, and the transportation of such goods is no more than an incident to such business. So, also, one, who transports the goods of another as a servant or agent of such other, is not engaged in the business of transportation, but in so doing is engaged in the business of his master or prin-

cipal, whatever that business may be. But one, who engages as an independent calling in the transportation of goods for another or for others under contract and for compensation, is engaged in the business of transportation and is a carrier."

Other cases to the same general effect are *People v. Montgomery, supra*; *Murphy v. Standard Oil Co.* 49 SD 197, PUR1926C 539, 207 NW 92; *Sioux Falls v. Collins* (1920) 43 SD 311, 178 NW 950, and *Rountree v. State Corp. Commission* (1936) 40 NM 152, 16 PUR(NS) 318, 56 P (2d) 1121; and while it may be said that the statutes of those states are not identical with ours, this court more than merely suggested a like construction of our own statute in *Christie Transfer & Storage Co. v. Hatch* (1934) 95 Mont 601, 3 PUR(NS) 487, 489, 28 P(2d) 470, 472, when it said: "Defendants and interveners are not motor carriers engaged in the business for hire, within the meaning of Chap. 184."

Appellants rely principally upon *Pure Oil Co. v. Cornish*, 174 Okla 615, 52 P(2d) 832, 834, which seemed to hold that one was a carrier who transported his own property. However, a reference to the statute in question shows that it specifically defined a Class C carrier to include "all carriers which are operated by owners for the transportation of their own property," etc., which our act does not attempt to do. The Oklahoma decision is therefore not in point.

It necessarily follows from what has been said that the defendants are not within the statute and cannot be denied the use of Montana streets and highways as an incident to the con-

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duct of their lawful business, nor be required to apply to plaintiffs for a certificate of public convenience and necessity as a prerequisite to such use. The learned trial judge committed no error in denying the injunctions sought in these three consolidated actions, and his order is affirmed.

Erickson, Anderson, and Morris, JJ., concur.

ANGSTMAN, J., dissenting: I dissent. I think the statute reaches operations here involved. As thus construed, the statute would not operate to put any person out of business, as suggested by my associates. If the Board of Railroad Commissioners would not issue a certificate of public convenience and necessity to those operating as the defendants do, then, instead of going out of business, they would simply be obliged to make use of the available carriers already in the field and holding a certificate. The suggestion that farmers, ranchers, and others would be required to obtain a certificate is untenable since they merely make occasional trips which are exempted by the act, subdivision (h), § 3847.1, Rev. Codes. I see nothing in the suggestion that the title of the act is misleading.

In disagreeing with my associates I

am accepting as law the majority opinion in the case of *Barney v. Railroad Comrs.* (1932) 93 Mont 115, PUR 1933D 91, 17 P(2d) 82. By that opinion the law respecting the use of the highways for gain was upheld as reasonably calculated to guard against the abusive use of the roads and to promote the safety of the public. As the law is now construed by my associates, it is unjustly discriminatory as I pointed out in my dissenting opinion in the *Barney Case*, *supra*. Ownership of the property carried for gain cannot be made the basis of different treatment of different carriers. *Weaver v. Public Service Commission*, 40 Wyo 462, PUR1929D 625, 278 Pac 542, 548. As now construed, a person may engage in the regular business of carrying his own property for remuneration without being obliged to pay the fees which are exacted from one carrying the same property in the same manner and over the same highways when it belongs to another. The damage to the highways and the danger to the public are as great in the one case as in the other. To free the act from being unjustly discriminatory it must be construed as requiring a license and the payment of the fees for carrying property belonging to the carrier as well as when it belongs to another, when done for remuneration as here.

NEW YORK SUPREME COURT

NEW YORK SUPREME COURT, SPECIAL TERM,
ALBANY COUNTY

Long Island Lighting Company

v.

Milo R. Maltbie et al.

(176 Misc 1, 26 NY Supp(2d) 452.)

Courts, § 6 — Jurisdiction — Interference with Commission — Investigations.

1. The court will not inquire into the question whether an investigation should be made by the Commission, or its necessity, which are matters within the discretion of the Commission, p. 228.

Valuation, § 10 — Powers of Commission — Book records.

2. The power of the Commission to investigate the accounts and other affairs of a public utility subject to its jurisdiction includes authority to inquire into the value of property owned by the corporation, and the Commission may not be precluded, in the scope of its proof at least, by what is shown on the books of the utility as the value of property, or by what is shown in other records, corporate or private, as to value, p. 228.

Courts, § 6 — Investigation by Commission — Power to determine method and scope.

3. The Commission, and not the court, is the judge of the direction to be pursued in investigating the affairs of a public utility company, so long as the inquiry remains within the frame of powers delegated by the legislature, p. 228.

Evidence, § 16 — Powers of Commission — Investigations — Value of stock — Depreciation method.

4. The Commission, in investigating the value of stock of a public utility company held by another public utility company, has power to receive evidence relating to the value of the stock based on facts relating to the issuing company and is not confined to records of the stockholder, and it may receive evidence as to straight-line depreciation although the issuing company uses the retirement reserve method of accounting under rules promulgated by the Commission, p. 228.

Judgment, § 1 — Declaratory judgment — Rulings on direction of inquiry.

5. A corporation subject to the power of inquiry vested in the Commission cannot sue the Commission to obtain a declaratory judgment containing detailed rulings upon the direction that the inquiry shall take within the general jurisdiction of the administrative body; if errors are committed in respect of a subject within the Commission's jurisdiction, they are to be corrected upon a review of the result, p. 230.

[February 25, 1941.]

ACTION by public utility company against the Commission and its members for declaratory judgment as to rights involved in pending investigation by Commission; complaint dismissed.

LONG ISLAND LIGHTING CO. v. MALTBIE

APPEARANCES: Charles G. Blakeslee, of Mineola (Edward J. Crumme, of New York city, and John J. Donohue, of Albany, of counsel), for plaintiff; Gay H. Brown, Counsel to Public Service Commission, of Albany (Laurence J. Olmsted, of Syracuse, and Sherman C. Ward, of Albany, of counsel), for defendants.

BERGAN, J.: Plaintiff Long Island Lighting Company is a "gas corporation" and an "electric corporation" as those terms are defined by Public Service Law, § 2. Defendants are the Public Service Commission and the members constituting the Commission. Plaintiff is the owner of 48,868 shares of the Kings County Lighting Company which it acquired for \$5,141,704.11 by the permission of the Public Service Commission. The Kings County Lighting Company also is a "gas corporation." Both it and the plaintiff, therefore, are corporations subject to the jurisdiction of the Public Service Commission.

The Commission, upon its own motion, has been investigating the plaintiff's method of accounting by a proceeding instituted in 1937 which is still pending. In the course of this inquiry the Commission has introduced evidence into the record showing the result of an examination prepared by it of the records of the Kings Company. The resulting computations show depreciation of that company's property in accordance with the "straight-line" method of computation. Plaintiff objected to this proof. The purpose of this evidence is to make a finding of the value of the stock of the Kings Company owned by the plaintiff, upon the basis of the

"straight-line" method of depreciation indicated by computations in the Commission's exhibit in the proceeding.

The Kings Company itself does not use the "straight-line" method of accounting for depreciation, but, in accordance with the accounting rules promulgated by the Commission, uses the "retirement reserve" method of accounting for retirement and replacement of its property. The method being used in the proceeding before the Commission for determining the book value of the stock of the Kings Company owned by the plaintiff, therefore, is quite different from the basis of the book value of the stock as shown in the books of the Kings Company itself.

Instead of using the book value shown by the method of accounting used by the Kings Company with the approval of the Commission, as justification for the value of the stock held by plaintiff and thus reflected in its books, the plaintiff, to meet this proof in entirely different scope and character of "straight-line" depreciation now introduced by the Commission, must spend \$100,000. It must also pay the Commission's expense in the inquiry into the value of the property of the Kings Company, of which it is merely a stockholder, as well as the expense of the Commission's inquiry into its own property and methods of accounting generally. Public Service Law, § 18-a.

The action is for a declaratory judgment. The facts I have stated constitute the substance of the complaint. The defendants move to dismiss the complaint upon the ground the facts do not state a cause war-

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ranting a judgment declaring the rights of the parties. For the purpose of this motion the facts pleaded are deemed to be conceded by the defendants.

[1-4] The plaintiff's position in this action is that the Commission has no jurisdiction in a proceeding into plaintiff's accounts and records to conduct a collateral inquiry into the value of the property of the Kings Company at the plaintiff's expense for the purpose of determining the value of the plaintiff's stock in that company. It is further contended by plaintiff that the Commission has no power to proceed to evaluate a depreciation of the King Company's property upon a different basis from that allowed by the Commission to be followed by the Kings Company itself. It is argued that the exhibit that has been offered indicates the course that the inquiry is taking into "straight-line" depreciation of the Kings Company's property and the result that will be reached by the Commission. Such a method of evaluating depreciation, for the purpose of fixing rates at least, has been judicially disapproved.

Plaintiff further contends that this method of evaluating depreciation, departing as it does from the method followed by the Kings Company, will require the plaintiff to spend the substantial sum named in the complaint to meet that proof so that plaintiff may be properly protected upon the facts as well as the law in a direct review by certiorari after the Commission has made its determination.

The plaintiff, so it further argues, is faced with the alternative of either spending this large sum to defend its position on the facts of the deprecia-

tion of the company in which it owns stock in order to review the legal question of the propriety of the procedure followed by the Commission, or if it does not controvert the facts and reviews only the propriety of the procedure upon certiorari, to take the risk of being held in error upon its legal contention and at the same time be before the court with an inadequate record. In either case the expense of the collateral inquiry into the Kings Company property is being borne by plaintiff. Therefore, plaintiff contends that it presents the kind of controversy and disputed jural relation between it and the defendants to which the action for a declaratory judgment is useful and proper. *James v. Alderton Dock Yards* (1931) 256 NY 298, 305, 176 NE 401.

Plaintiff asks that the judgment to be given declare: (a) that the method being followed by the Commission to determine the value of the stock of the Kings Company is illegal, arbitrary, unduly burdensome, and void; (b) that the Commission has no power to require plaintiff to make entries on its books of the value of the stock other than the amount paid for it, and that an order directing the entry of any other amount is void; (c) that the Commission has no power in the proceeding to examine into the property of the Kings Company, to introduce evidence or to make a finding in respect thereof or in respect of the value of the stock held by plaintiff upon the basis of such an inquiry; (d) that the cost of the proceeding to plaintiff in relation to such examination renders the inquiry into the property of the Kings Company confiscatory and arbitrary and hence void; (e) that the

LONG ISLAND LIGHTING CO. v. MALTBIE

Commission has no power to assess against plaintiff the expense of this part of the inquiry.

The expense to the Commission of conducting this investigation is, by statute, a charge upon the utility. Public Service Law, § 18-a. It must be reasonably attributable to an investigation coming within the statutory duties of the Commission. The utility has the right to be heard by the Commission on the reasonableness of the charge, and such a determination is, of course, reviewable. The statute is constitutional and the court will not inquire into the question whether an investigation should be made, or its necessity, which are matters within the discretion of the Commission. *Bronx Gas & E. Co. v. Maltbie* (1935) 268 NY 278, 10 PUR(NS) 1, 197 NE 281.

The Commission, as the complaint itself pleads, has jurisdiction over plaintiff. It is vested with inquisitorial powers of broad calibre in respect of gas and electric corporations. Public Service Law, § 66, subs. 4, 9 and 11. It may prescribe the methods and forms of accounting. It may examine the accounts, books, contracts, records, documents, and papers of such a corporation. It may conduct an inquiry into "any matter within its jurisdiction" under Art. 4, § 64 et seq., of the Public Service Law, which relates generally to gas and electric corporations. This is the general frame of its powers of inquiry as distinguished from its power to regulate.

This power includes, surely, the authority to inquire into the value of property owned by a corporation within the jurisdiction of the Com-

mission. The Commission, thus broadly vested with the right to examine the affairs of a utility, may not be precluded, in the scope of its proof at least, by what is shown on the books of the utility as value of property, or by what is shown in other records, corporate or private, as to value. Tangible property thus valued upon the utility's books would be a proper subject for an independent inquiry by the Commission. The fact such property might otherwise be evaluated by contract, or by its owner if it were leased to the utility, or by public record, or even by the Commission's own prior findings, would not preclude inquiry and proof of facts indicating a different evaluation.

The Commission is not precluded in the scope of its inquiry by the mere form of a book value of corporate stock. It may receive evidence of a different value along any line of inquiry it deems germane to the exercise of its function. The Commission, and not the court, is the judge of the direction to be pursued, so long as the inquiry remains within the frame of powers delegated by the legislature. By whatever form of procedure this question is presented for judicial solution, therefore, whether it be in the form of this action for a declaratory judgment, or for relief presently in pursuance of Civil Practice Act, § 1296, subdivision 2, or after a determination has been made, under subdivisions 3 or 5 of that section, the answer to be given would be the same; that the Commission has the power to receive evidence in the scope complained of.

If the exercise of the power casts an unduly heavy burden of refuta-

NEW YORK SUPREME COURT

tation, or of expense, relief must be sought from the legislature.

[5] No attempt, of course, can be made here to deal with the correctness of a determination in the proceeding before the Commission, not yet made, and existing only in the apprehensive forecast of the plaintiff. Adequate relief and correction are available to plaintiff for the injury of an erroneous result.

In the procedural aspect of the motion, the facts pleaded do not show a good case for a declaratory judgment. A corporation subject to the power of inquiry vested in an administrative body exercising, as this Commission does, legislative and quasi judicial functions, cannot sue the body to obtain detailed judicial rulings upon the direction that the inquiry takes within the general jurisdiction of the administrative body.

If errors are committed in respect of a subject within the Commission's jurisdiction, they are to be corrected, like the errors of the law court, upon a review of the result. Then the error can be fully assayed in the light of its influence upon the decision or order. This will usually be no more burdensome to the utility than to the ordinary litigant and the principle is equally applicable.

The alternative would invite an independent and converging lawsuit to adjudicate every debatable step of an inquiry or a trial. Only where the naked jurisdiction is challenged, and not the direction of its exercise, will the court interfere to end before its conclusion a proceeding conducted without or in excess of authority. Civil Practice Act, § 1296, subd. 2. The facts here pleaded do not show

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confiscation of property under the extraordinary conditions which might require direct equitable intervention for relief against a rate determination. Consolidated Water Co. of Utica v. Maltbie (1938) 167 Misc 269, 25 PUR(NS) 241, 3 NY Supp (2d) 799. That remedy, when it exists, is against the enforcement of an order, and is not extended to a pending proceeding, the direction of which leads to expense in maintaining the inquiry or in refutation of proof.

Since a suit in law or equity is inappropriate in any stage to review the questions here raised, nothing is added by the precipitation of remedy which is the main function of the declaratory judgment. In *New York v. Maltbie* (1937) 274 NY 90, 21 PUR(NS) 446, 8 NE(2d) 289, the form of action for a declaratory judgment was sanctioned. (274 NY at p. 100.) But the sole question there was the jurisdiction of the Commission over the subject matter in an action at the instance of a plaintiff (the city of New York) over which the Commission has no power of inquisition or regulation. In the appellate division (248 App Div 39, 17 PUR(NS) 201, 289 NY Supp 562) it was indicated that the complaint, which was dismissed by the special term upon the merits, could have been dismissed because of its form alone (248 App Div at p. 41). The opinion at special term (159 Misc 276, 14 PUR(NS) 333, 287 NY Supp 868) considered only the merits of the controversy and not the form of remedy.

It was pointed out in *Kovarsky v. Brooklyn Union Gas Co.* (1938) 270 NY 304, 313, 314, 26 PUR(NS) 353, 18 NE(2d) 287, upon the au-

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authority of New York v. Maltbie and other cases, that the court may entertain jurisdiction of an action similar in form to this, but the determination quite largely depends upon the inadequacy of the legal remedy available. There it was found the consumer's remedies against a purported illegal service charge were inadequate and the form of action adopted, for an injunction and accounting as well as a declaratory judgment, was available.

The situation there presented was held to be distinguishable (279 NY at p. 312, 26 PUR(NS) at p. 356) from that which existed in New York State Electric & Gas Corp. v. Maltbie (1935) 266 NY 521, 195 NE 182, in which there was an order in a proceeding before the Commission to which the company was a party, "and it could have reviewed the order by certiorari, the usual practice instead of instituting a new action. In the pres-

ent action the plaintiff was not a party to the order fixing the rate, and thus he has not abandoned one method of review by seeking another." Upon the same principle, and for the same reason, I think the facts presented by this complaint are distinguishable from the facts considered in the Kovarsky Case, *supra*.

Nor are facts presented, as in Post v. Metropolitan Casualty Ins. Co. of New York (1929) 227 App Div 156, 237 NY Supp 64, which would render a declaration useful or proper. On the contrary, a declaratory judgment in this stage of the proceeding would be fruitful in the production of litigation in every state of an inquiry by the Commission which would tend to distort the pattern of public utility regulation in the state, and the orderly judicial review of public service determinations.

Complaint dismissed, without costs.
Submit order.

OKLAHOMA SUPREME COURT

Norman Barker

v.

Reford Bond et al.

[No. 29838.]

(— Okla —, 111 P(2d) 507.)

Reparation, § 9 — Powers of court — Interference with Commission — Impounded funds.

Where a proceeding has been started before the State Corporation Commission of Oklahoma to investigate and adjust the rates charged by a telephone company subject to its control, and in the course of the proceeding a sum of money is impounded to be refunded to the patrons of the tele-

OKLAHOMA SUPREME COURT

phone company, the powers conferred upon the Commission by the Constitution and statutes of Oklahoma in respect to the impounding and disbursement of this fund are judicial in nature, and the district courts of this state do not have the power or authority to direct the Commission in the distribution of such fund.

[March 18, 1941.]

Headnote by the COURT.

A PPEAL from judgment of district court dismissing action against Commission to obtain allowance of attorney's fees from funds impounded during rate litigation; judgment affirmed.

APPEARANCES: Chas. West, of Oklahoma City, for plaintiff in error; L. V. Reed, S. J. Gordon, and Sid White, all of Oklahoma City, Mac Q. Williamson, Attorney General, and Randell S. Cobb, Assistant Attorney General, for defendants in error.

BAYLESS, J.: This action originated in the district court of Oklahoma county, wherein Norman Barker filed his petition against Reford Bond, A. S. J. Shaw, and Ray O. Weems, "as the Corporation Commission of the state of Oklahoma," and A. F. Sweeney, seeking the allowance of an attorney's fee from funds in the control of the defendant members of the Corporation Commission for services rendered defendant Sweeney in relation to said fund. His action was dismissed, and this appeal followed.

In the petition plaintiff outlined in detail services he rendered as an attorney for defendant Sweeney in filing and successfully prosecuting a proceedings before the state Corporation Commission, and on appeal, for a reduction in telephone rates in the city of Tulsa. He alleged that a large sum of money was saved to the telephone users of Tulsa and that equita-

ble principles dictated that he, as the attorney whose services aided in this result, should be adequately compensated. He alleged that while the sum saved in the aggregate was large, it was owing to many persons, usually in such small sums as to render it impracticable to seek compensation from each or several of such persons. He alleged further that a large part of the sum had been distributed by the Corporation Commission without regard to his rights and that only about \$50,000 remained in its hands unclaimed, and he asked that the district court in the exercise of its powers of equity fix a reasonable attorney's fee for the services rendered and order the defendant Corporation Commission members to pay it from the fund in their control as such commissioners. His only allegations for relief in so far as Sweeney is concerned is that Sweeney has procured the services of another lawyer, thereby implying that their interests no longer wholly coincide.

The defendant Corporation Commissioners filed a substitute demurrer reading:

"That this court has no jurisdiction of the defendant the Corporation Commission of the state of Okla-

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thoma, the suit being, in effect an action against the state.

"That this court has no jurisdiction of the subject matter of this action.

"That there is a defect of parties defendant in that the petition shows on its face that the funds alleged to be now held by the Corporation Commission is the property of persons not made parties defendant and who are necessary parties to the action.

"That the petition does not show facts sufficient to constitute a cause of action in favor of plaintiff and against Reford Bond, A. S. J. Shaw, and Ray O. Weems as the Corporation Commission of the state of Oklahoma."

This demurrer was sustained by a general order to which plaintiff excepted and requested time in which to amend.

Thereafter plaintiff filed "Application of Plaintiff to Amend," reading:

". . . by inserting these words at the end of the allegation before the prayer:

"Plaintiff did not delay in making this application, though a cursory examination might leave that impression. Plaintiff has at all times acted in good faith in this matter and pursued what course appeared to him to be reasonable and prompt.

"That he could not apply to the Commission for relief while the case was pending before said Commission because said Commission had no equitable jurisdiction to a charge on the fund for plaintiff's benefit. That he did not and could not apply to the Supreme Court for such relief before the case went to the Supreme Court of the United States, because the decision was immediately superseded by

the telephone company. He did act promptly to ask relief of the Supreme Court, immediately after the case reached the Supreme Court on remand from the Supreme Court of the United States, and because the Supreme Court wished to remand the case to the Commission his application had to be heard before a referee before the plaintiff could search through the records and find all the supporting facts. It was this haste in preparation before the referee which caused him to fail to find the vital words in the order and opinion of the Supreme Court upon which reliance is placed here to show that plaintiff was the moving cause in obtaining for the beneficiaries the refunds made in the telephone case. Plaintiff was forced to place upon the witness stand before the referee an employee of the Commission who testified that plaintiff was not such moving cause. This testimony was doubtless given by mistake of the witness but compelled the plaintiff to dismiss his case before the Supreme Court without prejudice because he morally knew that the witness was wrong but at that time did not know how to prove the witness's mistake. For this reason the Supreme Court was prevented from giving the plaintiff relief and after plaintiff's said dismissal the case was at once remanded to the Commission.

"Plaintiff then painstakingly went over all the record of the case and attempted to go through all the extraneous evidence and discovered the proof that the Commission had consolidated his case with that of the Commission, though without making an order to that effect at that time, and discovered the vital language in the opin-

OKLAHOMA SUPREME COURT

ion and the order of the Supreme Court, one quoted and referred to in this petition, the other cited in the argument on the demurrer. Plaintiff thus discovered that he was right as he supposed in believing that he was the moving cause of said refund. Plaintiff could not at that time resort to the Supreme Court, because it had remanded the case and would not take it on application direct to it, but was forced to apply to this court as one of equity."

The defendants Corporation Commissioners evidently treated this as being an amendment or that the application to amend had been granted for they filed "Motion to Strike, Amendment and Dismiss Petition." This motion was sustained, and the action was dismissed.

We do not pass upon the issue raised by defendants on the authority of *Wagner v. Thorpe* (1931) 151 Okla 142, 2 P(2d) 1027, for this necessitates a determination whether the amendment made the petition good, which in turn necessitates determining wherein the petition was defective. When we have determined wherein it was defective, we find it is incapable of being remedied and no occasion then exists for weighing the amendment.

The history of this matter may be found in *Southwestern Bell Teleph. Co. v. State* (1937) 181 Okla 246, 247, 19 PUR(NS) 391, 71 P(2d) 747; *Id.* (1938) 303 US 206, 82 L ed 751, 23 PUR(NS) 289, 58 S Ct 528. The powers of the Corporation Commission and the things it can do in these matters are outlined in the Constitution and statutes of this state.

In *State ex rel. Crawford v. Corpo-*
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roration Commission (1938) 184 Okla 127, 85 P(2d) 288, 290, we said: ". . . The fund in the instant case represents the charges made and collected by the telephone company in excess of the rate fixed by order of the Commission, and its determination is governed by said § 3626, 17 Okla. Stat. Ann. § 121. Section 3627, OS 1931, 17 Okla. Stat. Ann. § 122, authorizes the Commission to render judgment against the company for the amount of the overcharge, the charge in excess of the legal rates. The powers conferred by these sections are clearly judicial in nature, and the disbursement of the fund is controlled by the Commission as a judicial body, and as incident to its power to enforce its judgments." This was said with respect to the proceedings for rate reduction and the fund created thereby involved here.

We think it is decisive of the issue that the district court lacked jurisdiction of the subject matter raised by the demurrer. The matter of the proceedings by which the funds came into existence is exclusively within the original jurisdiction of the Corporation Commission under our Constitution and applicable statutes and the power to determine the amount of the fund, the persons entitled thereto and the amount to be paid to those entitled to the fund is clearly a part of the administration of the judicial powers thus conferred, *State ex rel. Crawford v. Corporation Commission, supra*.

We hold that the district courts are without power in law or equity to direct the allowance of fees to attorneys out of these funds. The judicial power vested in the Corporation Commission, in these matters, with the

right of appeal, affords a forum and a complete remedy to anyone interested. No occasion can arise in one of these proceedings for resort to a district court in respect to the allocation and disbursement of such a fund.

The petition did not state a cause of action on account of this fundamental defect, and it was not subject

to being amended so to do. Therefore no error was committed when the demurrer was sustained, nor when the amendment to the petition was stricken and the cause dismissed.

Judgment affirmed.

Welch, C.J., Corn, VCJ, and Hurst and Arnold, JJ, concur.

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Re Atlantic City Sewerage Company

Rates, § 186 — Reasonableness — Burden of proof.

1. A public utility seeking authority to increase rates has the burden of proving the reasonableness of the proposed rates, p. 237.

Valuation, § 79 — Ascertainment of reproduction cost — Average prices.

2. Prices used in estimating reproduction cost new should not be confined to any particular date but may represent averages maintained through the reasonable time required for actual reconstruction of the property, p. 242.

Valuation, § 70 — Ascertainment of original cost — Book cost.

3. The net appraised value of a sewerage company recorded on the books years ago without the establishment of a depreciation reserve may be considered a reasonable estimate of original cost less depreciation as of that time, p. 244.

Valuation, § 108 — Depreciation reserve — Stockholders' sacrifice.

4. The amount of an accumulated depreciation reserve must be deducted, in order to determine the net investment in a sewerage company's property, where the funds acquired by means of a depreciation reserve are invested in the property and do not represent a sacrifice by the stockholders, p. 245.

Valuation, § 340 — Going value — Past deficits.

5. Past deficits during a development period must not be capitalized in determining going value, p. 246.

Valuation, § 351 — Going value — Solicitation of business — Training personnel.

6. Expenses incurred in attracting business or training personnel are not acceptable evidence of going value in rate cases, since they are operating expenses, p. 246.

Valuation, § 331 — Going value — Separate allowance — Absence of evidence.

7. Going value should be excluded as an item of property to be separately appraised in determining the fair value of utility property for rate-making purposes where there is no satisfactory evidence of the amount of going value, p. 246.

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Valuation, § 333 — Going value — Assembled plant.

8. Although the Board would make no separate allowance for going value because of the lack of evidence thereof, it recognized that there is an element of value in an assembled, established, and successfully operated plant, which is not present in property not so advanced, p. 246.

Valuation, § 293 — Working capital — Payment in advance.

9. No allowance for working capital may be included in the rate base of a sewerage company where it is the company's practice to bill and collect in advance for sewerage service, p. 248.

Return, § 26 — Reasonableness — Relation to bond interest — Sewerage company.

10. A return of approximately three times bond interest was held to be unreasonable for a sewerage company, p. 248.

Return, § 107 — Reasonableness — Sewerage company.

11. A sewerage company was authorized to charge rates yielding a 6 per cent annual return on its rate base, p. 249.

Expenses, § 92 — Rate case expenses — Amortization.

12. An annual allowance should be made in a sewerage company's operating expenses for the amortization of its rate case expenses, such being amortized over a period of ten years, p. 252.

Expenses, § 114 — Income taxes — Future contingencies.

13. A possible future increase in Federal income tax because of refunding of bonds at some indefinite time in the future is not a proper item to be included in revenue deductions in fixing rates for service for the present and reasonable future, p. 252.

Depreciation, § 70 — Annual allowance — Sewerage company.

14. A composite annual depreciation rate of 1.25 per cent was held to be adequate for a sewerage company, p. 253.

[April 9, 1941.]

INVESTIGATION into reasonableness of proposed rates for sewerage service; proposed charges disapproved.

APPEARANCES: Frank H. Sommer, Counsel, and John A. Bernhard, Assistant Counsel, for the Board; Thomas D. Taggart, Jr., Mayor, and Samuel Backer, Counsel, for City of Atlantic City; Atlantic City Real Estate Board and Atlantic City Hotelmen's Association; Samuel Backer, Counsel, for Atlantic City Chamber of Commerce; Joseph F. Autenrieth, Counsel, Thompson and Lloyd by John Lloyd, Jr., Counsel, for the Atlantic City Sewerage Company.

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By the BOARD: This proceeding resulted from a petition filed by the Atlantic City Sewerage Company, dated June 7, 1940, which asked that the Board approve a general increase in charges for service in the manner and form set forth in a revised schedule attached to the petition. The petitioner proposed that these increases should become effective on July 15, 1940.

The proposed schedule provided increases in the flat charges for each of

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the forty-one classes of service established by the schedule then effective and provided flat charges for two new service classifications (air conditioning and refrigeration). It is estimated that for 1941 the schedule of charges proposed by the respondent would increase operating revenue, after adjustments and refunds, by \$120,817, from \$441,438 to \$562,255. This is an increase of 27.4 per cent in operating revenue.

Among the reasons alleged by the company as justifying the petition for increased rates is the increase both in investment and operating cost resulting from installation of a chlorination plant pursuant to an order of the state department of health dated April 11, 1939. Reference is also made to increased taxes and the failure of present revenue to produce a fair return on the value of petitioner's property devoted to the public use.

[1] The burden is upon the petitioner to prove the reasonableness of this proposed general increase in charges for service.

I. History of Company and Description of Property

A review of the history of the company and a brief description of its business and property are necessary to an understanding of the issues presented in this proceeding.

Sewerage service in Atlantic City was first provided by the Improved Sewerage and Sewage Utilization Company under franchise granted November 12, 1884. The present Atlantic City Sewerage Company was incorporated December 28, 1888, and in 1889 took over the property of the

Improved Sewerage and Sewage Utilization Company.

On December 30, 1905, the city council of Atlantic City adopted an ordinance fixing a schedule of rates for the company. The rates so fixed were a slight increase over those previously charged.

The ordinance further made provision for acquisition by the city of Atlantic City, at any time prior to December 31, 1920, of all the real and personal property of the Atlantic City Sewerage Company, together with its rights and franchise used in connection with its sewerage system. A requirement of the ordinance with respect to the acquisition provision was that the company should annually, on or before the 1st day of February in each year beginning with 1907, submit to the city comptroller of Atlantic City a verified itemized statement of its expenditures for improvements and extensions of its system and plant during the preceding calendar year. The city comptroller was directed to audit and verify the statement by examination of the books, vouchers, payrolls, and records of the company, and to submit to the city council a report of his audit and examination.

There is no present available record of the charges for service made by the company when it first began operations. The original rates were increased by the ordinance, above referred to, adopted by the city council of Atlantic City on December 30, 1905. The ordinance rates remained in effect for a period of approximately sixteen years until, as a result of hearings on an application of the company for approval of increased rates, filed with the Board on October 28,

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1921, the Board ordered increased rates below those asked for by the company. These new and higher rates became effective August 1, 1922. Subsequently the company, on May 14, 1924, filed an application for further substantial increases in its rates. After a hearing, the Board granted the company's application. The present rates are those authorized by the Board, effective June 3, 1924.

References in this report to the 1921 rate case should be understood to refer to the proceedings above described.

The city of Atlantic City is located on a group of irregularly shaped sand islands on the southern New Jersey coast, with the principal area of the city situated on one large island. The highest point in the city is about 6 feet above high water, and in some places tidewater is found at 3 to 4 feet below the surface. Quicksand occurs frequently at varying depths. Separating the islands from the mainland on the west is a tortuous tidal channel, known as the Beach thoroughfare. This has various branch thoroughfares, which form the smaller islands. The city is bounded by the Atlantic ocean on the east.

The permanent population of Atlantic City is approximately 70,000, but at times during the resort season the population may increase to nearly 500,000. It is said that more than 16,000,000 people visit Atlantic City annually.

It is thus seen that the physical conditions, together with the unusually large fluctuation in population, create difficulties both in construction and operation of the sewerage system.

The original collecting system was

planned to serve what is now the principal commercial and hotel section of the city. The plan provided for a deep receiving well and pumping station located at Baltic avenue and Chalfonte avenue. Sewage flowed by gravity to the pumping station whence it was forced by pumps to filters on the meadows northwest of the city. In 1897 the sewage disposal works were moved farther out to what is known as City Island, where the present treatment plant of the company is located.

As the city grew the system was expanded to meet the additional requirements, until at the present time the area served by the collecting system of the Atlantic City Sewerage Company amounts to just a little less than 3 square miles.

Across inside thoroughfare and northwest of the southwestern end of the city lies the section known locally as Chelsea Heights. The facilities for handling sewage in this area are owned by the city of Atlantic City but are operated by the Atlantic City Sewerage Company under a contract with the city. This system is not connected physically with the system of the company.

Because of the limitations imposed by the topography of the area, expansion of the company's sewerage system took place by development of successive isolated drainage basins. In the beginning, sewage from these basins was permitted to flow directly by gravity into the thoroughfares. This objectionable practice led to agitation for treatment of the sewage and discontinuance of the discharge of sewage at the several points along the thoroughfares. Successive consolidations of the small collecting systems

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were made until at the present time all of the sewage is treated and handled at the City Island plant previously mentioned, with the exception of a summer peak flow which is treated and discharged at the Texas avenue plant.

The company's service area is composed of four principal districts, known respectively as the Baltic avenue district, Texas avenue district, Raleigh avenue district, and the Venice Park district. These names are derived from the location of the pumping station which serves each district. The Baltic avenue district is essentially the area served by the original plant; to the southwest is the Texas avenue district, and still farther southwest is the Raleigh avenue district. The Venice Park district is located on a separate island northwest of the Baltic avenue district.

The sewage collected in the Raleigh avenue district flows by gravity to the Raleigh avenue station, whence it is pumped through a 14-inch cast iron force main to a point on Texas avenue where it joins the sewage collected in the Texas avenue district. The Raleigh avenue station is equipped with two centrifugal sewage pumps having a total rated capacity of 3,168,000 gallons per day, and one centrifugal pump having a rated capacity of 2,376,000 gallons per day. These pumps are direct connected by vertical shafts with electric motors which are automatically controlled by the level of the sewage in the wet well and are so arranged that one of the pair of pumps is always held as a spare. The operating pump carries the load until its capacity is reached, when the large pump is thrown into service automatically.

The sewage received from Raleigh

avenue and that collected in the Texas avenue district flows by gravity through a 24-inch trunk sewer to the Baltic avenue station. However, for about six weeks during the summer there is a very marked increase in the flow of sewage. The excess of this flow over the capacity of the existing trunk sewer spills over a weir and is carried to the Texas avenue station where it is screened, treated, and discharged into the Beach thoroughfare. At low tide the discharge is by gravity but pumping is required at high tide. The pump equipment at the Texas avenue station consists of two centrifugal sewage pumps with a total rated capacity of 4,608,000 gallons per day, direct connected by vertical shafts with electric motors which are automatically controlled by the height of the tide.

At the Baltic avenue station all the sewage collected in the system is received, screened, and pumped through a system of cast iron force mains to the City Island treatment plant. At this station there are five modern centrifugal sewage pumps having a total rated capacity of 61,000,000 gallons per day, direct connected by vertical shafts to electric motors. In normal operation these pumps are used in combinations depending on the head to be pumped against. There are also two old centrifugal sewage pumps, with a total rated capacity of 14,000,000 gallons per day, belt connected to electric motors. These pumps are inefficient and are operated only under storm conditions. In reserve is a centrifugal sewage pump, with a rated capacity of 15,000,000 gallons per day, direct connected to a Diesel engine. The average pumpage at Baltic

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avenue station is 13,600,000 gallons per day. There has been a measured maximum daily pumpage of 19,553,000 gallons.

The sewage in the Venice park district flows by gravity to the Venice park pumping station, whence it is pumped through a 10-inch cast iron force main to the City Island treatment plant. The station pumping equipment consists of two centrifugal sewage pumps, with a total rated capacity of 864,000 gallons per day, direct connected by vertical shafts to electric motors. These pumps are automatically controlled and one is held in reserve.

At the City Island treatment plant the sewage passes through a grit chamber, is chlorinated and then passes through twelve sedimentation tanks. The effluent from the sedimentation tanks is discharged into the Beach thoroughfare. The sludge from the sedimentation tanks is removed by pumps, spread on sludge beds to dry and is finally disposed of as material for raising the elevation of the surface of City Island.

The collecting system of the company consists of eighty-one miles of pipe ranging in size from 6 inches to 66 inches. The pipe is chiefly terracotta with a small amount of cast iron pipe and a very small amount of 15 inch to 66-inch diameter concrete pipe. These collecting mains are laid at depths ranging from practically at the surface of the street to fourteen feet. The various force mains in the system consist of approximately $7\frac{1}{2}$ miles of cast iron pipe, mostly Class B, varying in size from 10 inches to 36 inches in diameter.

The number of service connections

has increased from 1849 in 1891 to 13,021 in the year 1940.

II. The Rate Base

1. Land and fill.

The evidence shows that as at December 31, 1939, the book cost of land was \$118,213. This amount of so-called "book value" does not represent the actual purchase cost of the land to respondent. As of December 31, 1921, an existing book cost of \$39,913 was written down to \$33,313 on the basis of the amount assigned to land in the Board's 1921 rate base allowance. The net additions to the land account from January 1, 1922, to December 31, 1939, amounted to \$84,900, making a ledger value at the end of the period of \$118,213. The historical cost of \$124,813 is supported in detail by Exhibit P-5 and it is probable that the actual expenditures approximate this sum.

Analysis of Exhibit P-5 shows that the expenditures charged to the land account for filling, dredging, and reclaiming amounted to \$47,734 on all land. The balance of \$70,479 may be regarded as the purchase cost of the land except as it has been affected by the restatements of book figures.

Mr. Stanley N. Williams, a qualified civil engineer, who has been associated with the engineering organization of Mr. Clyde Potts over a period of about twenty-five years, was the principal witness for respondent. He testified that the total expenditure for fill at City Island had been \$43,360, of which \$24,895 had been charged to the land account, and \$18,465 to the disposal plant accounts on respondent's books. The total amount of \$47,734 charged to the land account

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for filling, dredging, and reclaiming land included the \$24,895 at City Island, \$22,217 at the New York avenue storage yard, and \$622 at Venice park.

In his reproduction cost exhibit, Mr. Williams included \$16,750, plus overheads, for 67,000 cubic yards of fill at the City Island plant. It appears that Mr. Williams estimated that 67,000 cubic yards of fill had been required to place the City Island land in its present condition.

In addition, Mr. Williams for the company included land in his exhibits at its total book cost of \$118,213. The agreed inventory, which includes fill on land at City Island but not elsewhere, must be accepted by the Board as correct. Therefore, Mr. Williams' final estimate includes an element of duplication and is excessive by an amount which may be as large as \$47,734.

The lands owned by the Atlantic City Sewerage Company were independently appraised on behalf of Atlantic City by Messrs. Myers and Beckman with respect to their current market value. There is no question concerning the qualifications of these men. Mr. Myers has been engaged in the real estate business in Atlantic City for twenty years and Mr. Beckman for sixteen years.

Mr. Myers testified that the aggregate fair market value of the several parcels of land owned by the respondent is \$32,453. This estimate of current market value is based upon the present condition of the land, except that the land upon which the City Island plant is located was appraised as unfilled land. The lands were ap-

praised by Mr. Beckman at \$31,459 on exactly the same basis.

The testimony by these local real estate experts has persuasive force. An average appraised value of \$32,000 will be accepted by the Board as the reasonable current market value of land including the City Island tract in an unimproved condition. Mr. Williams' estimate of \$16,750, plus overheads, or a total cost of \$19,353, will be accepted as the cost of reproducing fill on land. Therefore, land plus fill will be included at \$51,353 on a present value basis and at \$124,813 for the purpose of the original cost estimate.

2. Evidence of cost of reproduction.

Mr. Stanley N. Williams on behalf of the Atlantic City Sewerage Company, and Mr. Malcolm Pirnie on behalf of the city of Atlantic City, each presented evidence of cost of reproduction new. Mr. Pirnie is a consulting civil engineer with some thirty years' experience in sanitary engineering, particularly with reference to waterworks, water supplies, sewerage, and sewage disposal.

The inventory of the collecting system and force mains, prepared by Mr. Williams as of December 31, 1939, had as its basis an inventory prepared by Mr. Clyde Potts in 1921. This 1921 inventory was revised by adding thereto the inventory of net additions to the collecting system and force mains for the years 1922 to 1939, inclusive. The collecting system and force mains amount to approximately 85 per cent of the total cost of the property on either a book cost or reproduction cost basis. The inventory of other property, pumping station and

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buildings also was prepared by Mr. Williams. The inventory of equipment, tools, materials, and supplies was prepared by the company.

Mr. Pirnie and the Board's engineers checked the inventory supplied by Mr. Williams and, after minor adjustments, there is substantial agreement as to the physical quantities.

The Williams estimate.

The inventory was priced on the basis of the prices current as of the date of the inventory. It was assumed that the entire property would be constructed over a period of two years. The following tabulation is a summary analysis of the cost of reproduction estimate as at December 31, 1939 submitted by Mr. Williams for the respondent. The table omits the items found to be improperly included and does not include fill on land or land itself which is shown elsewhere at appraised value.

Item	Reproduction Cost—New	Accrued Depreciation	Reproduction Cost—Less Depreciation
Material and labor	\$3,256,185	\$829,932	\$2,426,253
Engineering, legal and administrative costs (9%) ..	293,056	74,693	218,363
Interest during construction (6%)	212,955	54,278	158,677
Total	\$3,762,196	\$958,903	\$2,803,293
Pavement over mains—prior to 1921	\$103,749	\$39,840	\$63,909
Equipment, tools, materials and supplies .....	.....	.....	27,157
Total reproduction cost of property other than land	\$3,865,945	\$998,743	\$2,894,359

It should be noted that the above table omits items found to be improperly included, land as shown by the books, and fill on land.

In the judgment of the Board, the unit prices applied by Mr. Williams to the collecting system and force mains are on the high side. The superstructure of the Baltic avenue

pumping station is included at a reproduction cost estimate new of \$49,816. The Board is of the opinion that this amount is grossly excessive. Likewise the cost of piling and of concrete at the City Island plant is believed to be inflated.

Mr. Williams based his estimate of accrued depreciation upon the age-life method. Under this method an estimate of the expected life of different items of property is based on past experience and observation, then the amount of accrued depreciation is estimated as a straight-line relationship between the average actual ages of the property units and their estimated average service lives.

The Pirnie estimate.

[2] In his initial pricing of the inventory Mr. Pirnie applied unit prices current on October 31, 1940. He also assumed that the construction would be completed over a 2-year period.

The reproduction cost estimate of this witness is summarized as follows:

Material and labor	\$2,506,305
General construction overheads	389,480
Estimated reproduction cost new, exclusive of land and cost for replacing pavements	\$2,895,785
Deduct City Island land fill and overheads	19,353
	\$2,876,432

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Pavement:		
Actual amount from December 31, 1921, to December 31, 1939	\$83,729	
Allowance for pavement replaced prior to December 31, 1921, as claimed by company	103,749	
Equipment, tools, materials and supplies at company's book cost	48,913	
<hr/>		
Total estimate of reproduction cost new not including land	\$3,112,823	

Mr. Pirnie's estimate of accrued depreciation was \$555,000. This is a judgment figure. The witness supplied no estimates of depreciation materialized in classes of units or units of property. Mr. Pirnie explained that his method "approaches the observed depreciation method," and that based upon his general investigation of the condition of the property "it was just my judgment that that amount of depreciation was all that did exist in this property."

On the basis of spot prices as of October 31, 1940, Mr. Pirnie's estimate of cost of reproduction less depreciation, exclusive of land and fill, is \$2,557,823. Mr. Pirnie, however, made a series of adjustments in discussing this estimate as evidence of the rate base.

The first was the deduction of \$290,000 for the purpose of substituting the average cost of construction over the past 5-year period for the spot prices as of October 31, 1940. The witness testified that during recent years the cost of constructing sewerage properties had fluctuated at a level from 11 to 15 per cent below the construction costs as of October 31, 1940. It appeared, therefore, that the reproduction cost estimate by Mr. Williams and the \$2,557,823 found by Mr. Pirnie each are affected by the higher cost existing at the time of the appraisal.

The ascertainment of a reproduction cost estimate is not a matter of the exact equivalent upon the market of material prices and the cost of labor at the date of the appraisal. The courts have indicated that the prices should not be confined to any particular date but may represent averages maintaining through the reasonable time required for actual reconstruction of the property. (*Pacific Gas & E. Co. v. California R. Commission* (1938) 26 F Supp 507, 26 PUR(NS) 1.)

"It also is an established rule that prevailing prices for a particular year in question should not be deemed controlling, but rather average prices prevailing over a period of years immediately preceding, taken in connection with the reasonable outlook for the immediate future." (*Elko-Lamoille Power Co. v. Nevada Pub. Service Commission* (1932) 1 F Supp 790, PUR1933B 191, 195; *McCardle v. Indianapolis Water Co.* (1926) 272 US 400, 71 L ed 316, PUR1927A 15, 47 S Ct 144.)

The period recognized by Mr. Pirnie for pricing purposes was longer than the assumed construction period. It is possible, however, that he believed the longer period should be taken because of the hypothetical character of the reproduction cost estimate and the uncertainty as to prices during the immediate future. At any rate, the Board must reject the contention of counsel for petitioner that Mr. Pirnie's deduction of \$290,000 from his initial cost of reproduction estimate "is wholly illegal."

The second adjustment by Mr. Pirnie is the deduction of the difference between the accumulated depreciation reserve as adjusted to reverse the

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write-down (\$988,843) and his estimate of accrued depreciation (\$555,000). This deduction in the amount of \$433,000 was made on the ground that the company had collected amounts for annual depreciation in excess of its reasonable depreciation requirements, that the excess had been invested in the property, and that it is deductible as property contributed by the customers. Of course, the effect of this step is the same as though Mr. Pirnie originally had deducted the total depreciation reserve and had prepared no estimate of accrued depreciation. Deduction of the full amount of the depreciation reserve from investment cost supplies a figure which is evidence of the rate base. The depreciation reserve, however, is not necessarily the equivalent of the accrued depreciation, which is an element in a cost of reproduction estimate.

Mr. Pirnie also adds an amount of \$250,000 as a so-called allowance for "intangible values." The reasonableness of this addition will be discussed at a later point under the heading of "going value." It appears, therefore, that Mr. Pirnie's estimate of reproduction cost on the basis of average prices, depreciated, excluding land and "intangible values" is \$2,267,823.

3. *Evidence of original cost.*

[3] Mr. Schwartz testified that \$1,923,070 is a reasonable estimate of the original cost less the adjusted depreciation reserve as of December 31, 1939. Mr. Schwartz has been connected with the Board's staff in various capacities for seventeen years and for three and one-half years has been deputy chief engineer and in this pro-

ceeding was in immediate charge of the work performed by the Board's engineers and accountants. The figure of \$1,923,070 is partly an estimate because the amount of fixed capital (\$622,412) shown by the books as of February 1, 1904, represented net current value and not actual cost to the Atlantic City Sewerage Company. It is not known whether this appraisal was in excess of or less than the actual investment in the property as at the appraisal date. There had been, however, no material change in the general level of construction costs during the preceding twenty years and the net appraised value, recorded on the books in 1904 without the establishment of a depreciation reserve, may be considered a reasonable estimate of original cost less depreciation.

The company's records show that gross additions to fixed capital from February 1, 1904, to December 31, 1921, aggregated \$723,386. Although detailed supporting records are not available, the city comptroller, in accordance with provisions of the city's purchase option, audited nearly all fixed capital additions from 1906 to 1920, inclusive. Counsel for the petitioner contends that because of the gap of two years in the audited records the amount of such gross fixed capital additions is in considerable doubt. Since the amounts for the 15-year period are supported by the city's audit, the Board sees no reason to question the correctness of the company's own general ledger figures for the remaining two years. A deduction of \$93,698 is made on account of the company's failure to record retirements on its books.

For the period from 1921 to De-

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cember 31, 1939, supporting records are available and were examined. The net additions shown by the company's records were reduced by \$11,914 to reflect adjustment of various errors discovered in the accounts.

The net additions during the period January 1, 1940, to October 31, 1940, are recorded on the books at \$155,608. This amount includes \$19,346 which represents the cost of experimental facilities and work which have been abandoned and which the Board considers should be written off. The estimated cost of completing the chlorination project is \$16,653, which amount the Board considers should be included in the rate base to be found. The adjusted amount is \$152,915.

[4] The depreciation reserve stated on the company's books as at December 31, 1939, was adjusted to reverse a net write-down of \$106,466 in 1925 and 1926 and to give effect to certain other adjustments totaling \$9,939. The adjusted depreciation reserve (\$998,783) is deducted from the estimate of \$2,921,853 as the original cost at December 31, 1939.

The brief of counsel for petitioner contends that because the net appraised value was recorded on the books in 1904, the effect of deducting the depreciation reserve is to make a double deduction for depreciation. Since no depreciation reserve had been accumulated or was reflected on the books in 1904, it is impossible to consider that the reserve accumulated subsequent to 1904 reflects depreciation accrued prior to that date. It also is contended that the purpose of the annual provision for depreciation since 1921 was to retire the \$1,775,000 gross appraised value recorded on

the books as of 1921, and that, therefore, the total amount of the depreciation reserve is not properly deductible from the original cost estimate.

The depreciation reserve represents the accumulated amounts set aside from revenue for the purpose of maintaining the integrity of the investment and not for the purpose of replacing the property at a transitory reproduction cost estimate.

It is usually provided that the depreciation reserve shall be accumulated by annual charges for depreciation expense against operating revenues. It is assumed, in the absence of a showing to the contrary, that revenues have been sufficient to pay operating expenses, taxes, and the depreciation expense and leave a fair return for the investors in the company. If these conditions are fulfilled, the depreciation reserve does not represent in any part a sacrifice by the stockholders of the company.

Funds acquired by means of the depreciation reserve are usually invested in the property. Otherwise, they remain as cash or exist as assets of some other form. Since such funds, so invested, do not represent a sacrifice by the stockholders, it is necessary to deduct the amount of the accumulated depreciation reserve in order to determine the net investment in the property.

The estimated original cost to December 31, 1939, less the adjusted depreciation reserve and the historical cost of land is \$1,798,257.

4. 1921 rate base adjusted.

Mr. William T. Riley, chief accountant of the petitioner, testified that the net book cost of the property was \$2,778,830 as at December 31,

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1939. The witness variously described this figure as "net book cost" and "net value assets." The figure is not an estimate of value. As a book cost figure it results from the fact that the rate base of \$1,600,000, fixed by the Board as of December 31, 1921, was substituted in the company's accounts for the then existing amounts of book cost. Regardless of whether such a write-up of book cost to "fair value" was permissible under the accounting standards and practices of the time, the resulting book cost figures have no significance today for the purposes of the present proceeding.

Further, the so-called book cost is a meaningless composite of appraised value of tangible property, actual cost of additions and improvements, and an allowance of \$135,000 for intangibles in the 1921 rate base.

Mr. Schwartz testified that the tangible property was included in the 1921 rate base at \$1,455,000. If the net additions from that date to December 31, 1939, plus the book cost of materials and supplies as at the latter date, are added, the total is \$3,191,069. Deduction of the increase in the depreciation reserve, as adjusted, from the Board's 1921 valuation of tangible property results in a figure of \$2,534,951.

5. *Going value.*

[5-8] The claim of respondent for an allowance of \$400,000 to represent going value is based upon the testimony of Mr. Stanley Williams, who estimated the income which would be foregone before "a company becomes self-liquidating." Briefly, the method adopted by the witness in preparing his estimate was to study the "developmental period," using for the

purpose the experience of other sewerage enterprises in securing customers in four towns, namely, Morristown, Rockville Center, Boonton, and Rockaway. He concluded from these studies that in Atlantic City 30 per cent of the total consumers would be attached at the start of operations, 64 per cent at the end of the first year, 73 per cent at the end of the second year, 82 per cent at the end of the third year, 91 per cent at the end of the fourth year, and 100 per cent at the end of the fifth year.

Having assumed that the plant would be constructed in its entirety prior to the beginning of operations, the witness estimated that the total percentage of idle plant would be 125 per cent over the period of five years. He further assumed that a fair rate of return was $6\frac{1}{2}$ per cent, and estimated that the total amount of "lost return" plus taxes on idle plant would be \$408,673 on the basis of his estimate of undepreciated reproduction cost.

This testimony by the Witness Williams is too speculative to be entitled to weight as evidence of the allowance which ought to be made for going value as an element of the rate base.

In the first place, Mr. Williams wholly disregarded the statement by the United States Supreme Court that: "Past losses obviously do not tend to prove present values." His method is the method of capitalization of past deficits which as long ago as 1921 the Supreme Court held to be improper. *Galveston Electric Co. v. Galveston*, 258 US 388, 66 L ed 678, PUR1922D 159, 166, 42 S Ct 351.

Mr. Malcolm Pirnie, who testified on behalf of Atlantic City, included

RE ATLANTIC CITY SEWERAGE CO.

\$250,000 as an "allowance for intangible values," which he described variously as "the developmental preliminary expense" and as the value as a going concern in excess of the value of the physical property which exists because the property has its attached business. Witness Pirnie made this lump sum allowance without any effort to lend objective support to his opinion.

In *Dayton Power & Light Co. v. Ohio Pub. Utilities Commission* (1934) 292 US 290, 78 L ed 1267, 3 PUR(NS) 279, 292, 54 S Ct 647, Mr. Justice Cardozo said: "Going value is not something to be read into every balance sheet as a perfunctory addition."

Neither Mr. Williams nor Mr. Pirnie made any effort to distinguish between value inherent in the property as a going concern and the value based upon its earning power in the market served. It is historical and current costs which are evidences of "fair value" or the rate base; hence the definition of going value in a manner which excludes market or commercial value forces reliance upon operating deficits or developmental costs such as the cost of attaching business or training personnel. These expenditures are charged as operating expenses and are not acceptable evidence of going value in rate cases.

The Supreme Court has referred to the duplication involved in recognizing developmental expenditures both as an operating expense and as an element in the rate base. *Los Angeles Gas & E. Corp. v. California R. Commission*, 289 US 287, 77 L ed 1180, PUR1933C 229, 53 S Ct 637; *Dayton Power & Light Co. v. Ohio*

Pub. Utilities Commission, *supra*; *Columbus Gas & Fuel Co. v. Ohio Pub. Utilities Commission* (1934) 292 US 398, 412, 78 L ed 1327, 4 PUR(NS) 152, 54 S Ct 763, 91 ALR 1403.

Even if acceptance of Mr. Williams' estimate were permissible under the decision of the Supreme Court in the *Galveston Case*, *supra*, it would be unacceptable because of its hypothetical nature. Neither the testimony in this proceeding nor available records indicate that operating deficits were in fact experienced by Atlantic City Sewerage Company during the period of the development of its property.

Even if operating deficits had been experienced it must be recalled that the testimony of Witnesses Williams and Pirnie was based upon cost of reproduction theories. The cost of reproduction approach accepts current conditions, including current or recent prices of labor and materials; to be consistent it must recognize the existing development of the market and living habits of the people served. The historical cost of securing acceptance of the service need never be duplicated. It is unnecessary today to recognize such cost in order to attract the capital required for reproduction of the sewerage plant and facilities.

The acceptance of and demand for sewerage service in Atlantic City is very unlike the acceptance of and demand for service in the four smaller communities studied by Mr. Williams as the basis of his estimates. Even if it were permissible for the witness to disregard current conditions, conclusions based upon the developmental periods in these four smaller communities would be highly conjectural

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and unreliable when applied to Atlantic City.

The Board considers that where there is no satisfactory evidence of the amount of going value, it should be excluded as an item of property to be separately appraised. *Columbus Gas & Fuel Co. v. Ohio Pub. Utilities Commission*, *supra*, at p. 411 of 292 US; *St. Joseph Stock Yards Co. v.*

6. *Working capital.*

[9] In view of the fact that the practice of the company is to bill and collect in advance for sewerage service, it is apparent that no allowance for working capital should be included as an element in the rate base of the Atlantic City Sewerage Company.

7. *Summary of rate base evidence.*

	Cost of Reproduction Estimates as Adjusted by Board			Original Cost Schwartz Estimate
	Williams Spot Prices	Pirnie Spot Prices	Avg. Prices	
1. Tangible property, excluding land, materials & supplies, and general equipment	\$3,865,945	\$3,063,910	\$2,773,910	\$2,748,127
2. Land and fill ¹	51,353	51,353	51,353	124,813
3. Tangible property; excluding materials & supplies, and general equipment ..	\$3,917,298	\$3,115,263	\$2,825,263	\$2,872,940
4. Depreciation	998,743	555,000	555,000	998,783
5. Item 3 less item 4	\$2,918,555	\$2,560,263	\$2,270,263	\$1,874,157
6. Materials & supplies and general equipment—net	27,157	48,913	48,913	48,913
7. Net plant additions 1/1/1940 to 10/31/1940, plus estimated cost to complete chlorination project ²	152,915	152,915	152,915	152,915
8. Total	\$3,098,627	\$2,762,091	\$2,472,091	\$2,075,985

¹ See Part II (1) of this decision.

² See Part II (3) of this decision.

United States (1935) 11 F Supp 322, 334; aff. 298 US 38, 80 L ed 1033, 14 PUR(NS) 397, 56 S Ct 720; *Denver Union Stock Yard Co. v. United States* (1938) 304 US 470, 479, 82 L ed 1469, 24 PUR(NS) 155, 58 S Ct 990.

For the reasons thus outlined, the Board will make no separate allowance for going value. It considers that there is an element of value in an assembled, established, and successfully operated property, which is not present in property not so advanced and has recognized this element to the extent which in its judgment is reasonable.

38 PUR(NS)

III. *The Fair Return*

[10] Mr. William C. Gilman, partner of the firm of Gilman and Hickey, investment counselors, testified that a return of \$160,000 would be fair and is required to maintain the credit of the company, enable it to obtain capital funds required for extensions and improvements, and enable it to refund its outstanding 6 per cent bonds at a reasonable rate of interest. Mr. Gilman was familiar with the character of the operations of the company and had studied its financial statements for a period of years. The witness' estimate of the cost of capital to the Atlantic City Sewerage Com-

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pany was based largely upon the available data with regard to cost of capital to other companies regarded by him as comparable with the respondent.

Mr. Gilman testified that the recent level of net operating revenue is not sufficient to permit the Atlantic City Sewerage Company to refund its bonds. It appears that his statement that \$160,000 is the fair return is based principally upon his estimate that if the net operating revenue of the company were "between two and three-quarter and three times" its interest requirements, it could issue 4 per cent refunding bonds at a premium sufficiently large to cover the call premium on the outstanding bonds and possibly the expenses in connection with issuance of new bonds.

The principal amount of the bonds outstanding in the hands of the public is \$1,350,000. Therefore, the annual interest requirement for 4 per cent bonds would be \$54,000. The return said by Mr. Gilman to be required is within the range of two and three-quarter to three times bond interest, which is equivalent to a fair return of from \$148,500 to \$162,000. Mr. Gilman's figure of \$160,000 thus is toward the upper limits of what is regarded by him as the area of reasonableness.

The Board does not believe that it would be reasonable to allow a return fixed at the upper limits of what is said by this witness to be the area of reasonableness. The yields on bonds of good and medium investment quality are at an extraordinary low level. The pressure of funds seeking opportunities for investment is so great that in the judgment of the Board a cover-

age of three times requirements is unnecessary and unreasonably high for a company such as the Atlantic City Sewerage Company. No other type of utility enterprise has either a more inelastic customer demand or a greater stability of revenue than a sewerage company.

IV. Finding as to Rate Base and Fair Return

[11] Weighing all the evidence, the Board finds that the fair rate base for the Atlantic City Sewerage Company as of October 31, 1940, and including the estimated expenditures subsequent to that date necessary to complete the chlorination project, is \$2,500,000, on which amount the company is entitled to earn at the rate of 6 per cent or \$150,000 per annum.

V. Revenues and Expenses

Statements relating to the annual operating revenues and operating expenses of the company are available from the annual reports filed with the Board and from Exhibits P-7, P-8, and C-3 in the record.

1. Operating revenues.

The company estimates that the operating revenue for each of the years 1940 and 1941, under present rates, will amount to approximately \$437,090.

Exhibit C-3, entitled "Staff Exhibit Relating to Operating Revenues, Operating Expenses, and Return," was introduced by the Board. Exhibit C-3 sets forth an estimate of the total operating revenues for the year 1941, under present rates, amounting to \$442,227. In arriving at this estimate appropriate consideration was

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given to the recent trend of various items of revenue as well as to prospective additional business to be obtained in 1941.

The revenue statements submitted by the company are distorted because of the accounting treatment of items in the following classifications:

1. Doubtful rentals.
2. Adjustments and refunds for nonuse.
3. Use of cars, plant, and marine equipment.

These distortions in the company's revenue statements must be eliminated before it is possible to estimate the true prospective revenues for the year 1941. The nature of the adjustments and the reasons therefor are fully set forth in Exhibit C-3. There was no rebuttal testimony or cross-examination of the witness on his revenue estimates.

The Board, therefore, concludes that a fair and reasonable estimate for operating revenues, under present rates, for the year 1941 is \$442,227. This amount will be used in subsequent calculations.

2. *Operating expenses.*

In Exhibit C-3 Mr. Schwartz shows that the accounting practice of the company with respect to certain items in the classification of expense accounts leads to a distortion of these expense items. Consequently, as in the case of operating revenues, it is necessary to make certain revisions and adjustments in the statements submitted by the company in order to arrive at a correct conclusion as to experienced annual operating expenses and a reasonable estimate for the year 1941.

In making such revisions and adjustments as shown in Exhibit C-3, appropriate consideration was given to the trends and averages of various principal operating expense accounts during recent periods of years terminating with the year 1939. In view of the rather constant level of expenses as a whole in the period 1934 to 1939, inclusive, it is considered that an estimate for the year 1941 should be based on adjusted expenses for the year 1939. Exhibit C-3 shows adjusted operating expenses of \$127,986 for the year 1939.

Among the adjustments included were eliminations of \$840 for rent of an office in New York city, and \$2,650 for the salary of a secretary to Mr. Calvert, president of the company. The testimony shows and the Board finds that neither the interests of the company nor its customers require the maintenance of an office in New York city, and furthermore, that the salary of a secretary to the president of the company is not an appropriate expense for the sewerage company, because her duties are almost exclusively concerned with other matters in Mr. Calvert's office. On the other hand, the Board finds that it is reasonable to make some allowance for additional office space in Atlantic City, and in view of the lack of any testimony in respect to the exact requirements, it will make an allowance for additional rent equal to the rent now being paid for office space in New York city, i. e., \$840.

The Board concludes from its consideration of the evidence that for the purpose of this case the amount of \$127,986 plus an allowance of \$840 for rent of additional office

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space at Atlantic City, or a total of \$128,826, represents a reasonable annual allowance for operating expenses, exclusive of taxes, depreciation, and additional chlorination expenses.

3. *Chlorination expenses.*

The matter of determining a reasonable estimate of chlorination costs is of major importance. Exhibit P-1 is a copy of an order of the state department of health which calls for "continuous disinfection of all sewage . . . as to cause destruction of the organisms of the coli-aerogenes group to the extent that they shall be absent at all times in the final effluent in all standard one cubic centimeter portions; and effective sedimentation to mean: the removal of suspended solids . . . so that the aforesaid effective chlorination will be obtained." Exhibit P-12 represents a report by the bureau of engineering of the state board of health with respect to chlorination of sewage at the City Island plant, which sets forth the following conclusions:

"1. That the aforesaid additions and alterations to the City Island plant, particularly the settling units, were not in operation a sufficient length of time to permit the establishment of a procedure of efficient operation.

"2. That if the additions and alterations were completed and operated fully in an efficient manner, the sewage treated at the City Island plant on October 15 and October 23, 1940, could have been disinfected effectively with an application of chlorine slightly in excess of 30 p. p. m.

"3. That a higher rate of chlorine

application should be required to treat the more concentrated sewage during the peak summer loads, but that this amount could not be forecast on the basis of the available data."

Mr. Joseph LeChard testified for the company with respect to the additional chlorination and other expenses. Mr. LeChard is sanitary engineer for the company, which position he has held for the past twelve years. He has had prior experience and training in sanitary engineering.

Exhibit P-7, submitted by Mr. LeChard on behalf of the company, makes claim that the additional annual operating costs for chlorination and the enlarged sedimentation plant, exclusive of depreciation, would be \$45,092. Mr. Pirnie, the city's witness on the subject, testified that in his opinion such additional operating costs would amount to \$40,745. Mr. Schwartz, testifying for the Board, accepted Mr. Pirnie's estimate as reasonable and used it in his computation.

The problem involves a determination of the relative weights to be given the evidence supporting the company's estimate and the Pirnie estimate. It will be noted that the difference between the two estimates is \$4,347, which is approximately 10 per cent.

Mr. LeChard testified that in making up his estimate he used the dosage indicated as proper by the engineers of the state department of health.

Mr. Weston Gavett of Mr. Clyde Potts' organization, qualified as a sanitary and hydraulic engineer, testified in considerable detail concerning the requirements of the state department of health and also concerning conferences between the parties which were held prior to the issuance

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of the chlorination order by the state department of health. Mr. Gavett has done considerable work on experimental chlorination of Atlantic City sewage. His testimony supported that of Mr. LeChard.

Mr. Gavett testified that the present regulations of the state department of health for effective disinfection of Atlantic City sewage is "more than is usually required in sewage chlorination." Counsel for Atlantic City contended that the prospective cost of chlorination is excessive because the standard of purification established by the order of the state department of health is unreasonably high. However, the Board of Public Utility Commissioners must, for the purpose of this rate proceeding, give effect to a valid and effective order of the state department of health.

Mr. Pirnie and Mr. LeChard did not agree as to the number of additional employees that would be required to operate the new facilities. Mr. Pirnie estimated that the additional labor could be performed by one less man than estimated by Mr. LeChard. The make-up of the labor item was explained in full detail by Mr. LeChard.

In view of the testimony on this point the Board will allow, for the purposes of this decision, the amount of \$45,000 to cover estimated additional annual operating expenses, exclusive of depreciation, incident to the operation of the treatment facilities installed pursuant to the order of the state department of health. If the order of the department of health is modified and the additional operating expense proves to be less than \$45,000, the Board will require appropriate adjustments to be made.

4. *Rate case expenses.*

[12] The Board is of the opinion that an annual allowance should be made in operating expenses for the amortization of the cost to the company of the present proceeding. It appears from the tentative information available to the Board that such cost will amount to approximately \$30,000.

The Board concludes that whatever the exact amount of reasonable rate case expense it should be amortized over a period of approximately ten years and the amount of \$3,000 will be included in operating expenses for the purposes of this proceeding.

In respect to these rate case expenses, the Board will require the company to submit, as soon as practicable after the termination of this case, an itemized statement of the actual expenditures made by the company.

5. *Taxes.*

[13] Exhibit C-3 includes an estimate of annual taxes for the year 1941, which gives effect to the prospective changes in operating expense items as listed in the exhibit. The reasonableness of this estimate has not been seriously questioned and it is accepted by the Board. However, the amount of \$100,153 is adjusted by reduction to \$98,435 in order to give effect to a change in estimated Federal income taxes due to further adjustments of operating expenses made in this decision.

Since the company has not actually refunded its bonds, the Board concludes that a possible future increase in Federal income tax because of re-funding at some indefinite time in the

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future is not a proper item for inclusion in revenue deductions in fixing charges for service for the immediate present and reasonable future. The tax rates used in the estimates are those of the known present and no attempt has been made to forecast future tax levels. The effect on total taxes of any increase in charges for service which may be allowed as a result of this proceeding is recognized later in this decision.

6. *Annual depreciation expense.*

[14] As of December 31, 1939, the depreciation reserve balance as shown on the company's books amounted to \$882,377. After giving effect to reversal of adjustments made by the company in connection with setting up a previous appraisal on its books, the depreciation reserve balance as of December 31, 1939, amounts to \$998,783. The latter figure is equivalent to approximately 36.34 per cent of \$2,748,127, which is the estimate of original cost of depreciable property, not including trucks, tools, and equipment, as of December 31, 1939.

If the company were to continue to charge depreciation in accordance with its present practice, it is evident that an amount sufficient fully to retire all property now in existence would be accumulated long before the property would reach the end of its useful life. Therefore, it is concluded that the company's annual charge to expense for depreciation is excessive. The company's annual provision for depreciation obviously is based upon estimated service lives which are shorter than the service lives suggested by either the company's experience or by the testimony

of Witnesses Williams and Pirnie. Another factor which contributes to the excessive annual charges for depreciation expense is application by the company of its adopted depreciation rates to written-up ledger values instead of actual cost of the depreciable property.

The company questions the propriety of Mr. Schwartz using his estimate of original cost as the basis for calculation of the annual depreciation charge. The correctness of the original cost estimate is established elsewhere in this decision. The company's further objection to Mr. Schwartz's estimate of the annual depreciation requirement is an attempt to justify the 1925 write-up of its fixed capital and its practice of applying the depreciation rate to this inflated amount.

The Board's engineers have made an independent study of the company's retirement experience during the period from January 1, 1922, to December 31, 1939. This study indicates that retirements of property during the period averaged \$10,300 per annum, which gives an average experienced retirement rate of 0.46 per cent of the cost of depreciable property. Since the retirement experience alone does not represent the full amount of depreciation that should be provided for, the Board's engineers adjusted the analysis figures and arrived at an overall rate of 1.1 per cent of the cost of depreciable property exclusive of trucks, tools, and equipment, as representing their judgment of an appropriate rate of depreciation accrual.

If this over-all rate of 1.1 per cent is applied to the cost of depreciable property exclusive of trucks, tools,

NEW JERSEY BOARD OF PUBLIC UTILITY COMMISSIONERS

and equipment as of December 31, 1939 (\$2,748,127), the result is \$30,229. To this amount must be added annual depreciation on the new chlorination facilities and on trucks, tools, and equipment. It is shown in Exhibit C-3 that the present annual depreciation on the chlorination facilities is \$4,621, which is at the rate of approximately 3 per cent; and on trucks, tools, and equipment it is \$3,263, which is at the rate of approximately 10 per cent. It is further shown in Exhibit C-3 that of this latter amount only \$2,219 is, on the average, assignable to operating expenses. Thus, the present total annual charge to expense for depreciation should be \$37,069.

In arriving at this conclusion actual retirement expense has been used merely as a guide and appropriate consideration has been given to the expected service lives of the various items of property and the manner in which the property is being maintained. The Board is of the opinion that a composite annual depreciation rate of 1.25 per cent is adequate to provide for retirements as they occur and will for the future provide a sufficient margin for accumulation of additional reserve so that the integrity of the investment will not be impaired. After giving consideration to the net additions to property during 1940 (not including chlorination and treatment facilities already provided for) and the prospective additions during 1941, the Board concludes that \$37,250 is a reasonable allowance for annual depreciation expense for the purpose of this case.

The company's argument that \$37,000 is not a sufficient annual depre-

ciation allowance because of anticipated price increases in the next few years is not pertinent because the cost to be retired is the original cost of the property. The argument that the company will be unable to refund its bonds because of an inadequate depreciation accrual has no force because the present adjusted reserve is equivalent to 36.34 per cent of the estimated original cost of the depreciable property and is more than ample to cover the depreciation now accrued in the property.

VI. Summary and conclusions as to fair return

The estimated annual return which the company should experience under present rates, after providing for adjusted operating expenses, chlorination expense, amortization of rate case expense, taxes, and depreciation is \$129,716, as follows:

Estimated Operating Revenues	\$442,227
Revenue Deductions:	
Adjusted Operating Expenses	\$128,826
Estimated Chlorination and Related Expense	45,000
Amortization of Rate Case Expense	3,000
Estimated Taxes	98,435
Depreciation Expense	37,250
	312,511
Estimated Annual Return	\$129,716

The Board has found that the fair annual return for the respondent as of the present time is \$150,000. Thus it appears that the return the company is able to earn under present rates is \$20,284 less than it is entitled to earn. Because the company must pay a franchise tax of 5 per cent on operating revenue and a United States income tax of approximately 24 per cent on net taxable income it is found that an increase in operating

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revenue of \$28,013 will be required to realize the additional return of \$20,284 to which the company is entitled. Therefore, the Board will permit the company to increase its charges for service to the extent necessary to produce additional operating revenue of approximately \$28,000, including revenue to be derived from the two additional classifications for service proposed by the company, viz.: refrigeration and air conditioning, service heretofore furnished without specific compensation.

If the company were permitted to

charge for its service in accordance with the rates proposed to become effective July 15, 1940, it would realize an annual operating revenue of approximately \$562,255 which is approximately \$92,800 greater than the operating revenue found by the Board to be adequate in this situation.

The Board therefore finds that said charges for service proposed by the company and suspended by the Board are unjust, unreasonable, and higher than necessary to produce a fair return and that they should be disapproved.

COLORADO PUBLIC UTILITIES COMMISSION

Rocky Mountain Motor Company

v.

Pikes Peak Auto Livery

[Case No. 4835, Decision No. 16949.]

Appeal and review, § 73 — Commission action pending determination.

1. An order of the Commission, in the absence of a stay, is not suspended pending review by the courts, p. 256.

Commissions, § 11 — Jurisdiction — Permitting violations of law — Dismissal of proceeding.

2. The Commission, being without jurisdiction to sanction or permit violations of law or of its decisions, has no jurisdiction to dismiss or suspend a proceeding instituted for violation of an order which is involved in pending court proceedings but is not stayed, since this would result in operations by the respondent in violation of law, p. 256.

[April 1, 1941.]

MOTION to dismiss or suspend proceeding based on violation of Commission order involved in pending judicial proceeding; motion denied.

APPEARANCES: Hodges, Vidal, for complainant; Conour and Conour, and Goree and Joe Hodges, Denver, Attorneys at Law, Del Norte, for re-

COLORADO PUBLIC UTILITIES COMMISSION

spondent; E. B. Evans, Denver, for the Public Utilities Commission of the state of Colorado.

By the COMMISSION:

[1] This matter comes on for hearing upon the motion of the respondent to dismiss or suspend the above case, on the ground that this Commission is without jurisdiction to hear or determine the questions raised by the complaint, for the reason that the decisions of this Commission entered in Application No. 736-B are involved in a proceeding pending before the supreme court of the state of Colorado on writ of error to review the judgment of the district court of El Paso county quashing the writ of review issued by said court upon the petition of respondent to review the decisions of this Commission entered in said Application No. 736-B. Neither at the time of filing the petition for review, nor at any time subsequent thereto, has respondent, in accordance with the provisions of § 53, Chap. 137, 1935 Colo. Stats. Anno. obtained a stay of said decisions of this Commission. In the absence of a stay having been granted in accordance with this section of the Public Utilities Act, the orders and decisions of this Commission became effective upon their effective dates.

The fact that proceedings for review are commenced and pending does not suspend the orders or decisions of this Commission, Pond on Public

Utilities, Vol 3, § 930, p. 1892. In fact, the first clause in § 53 (a) reads as follows:

"The pendency of a writ of review *shall not* of itself stay or suspend the operation of the order or decision of the Commission. . . ."

[2] The allegations of the complaint, which must be taken as true upon this motion to dismiss, show that the respondent is violating, or threatening to violate, the provisions of the decisions of this Commission in Application No. 736-B. The effect of granting the motion to dismiss, if the allegations of the complaint are true, would be to sanction violations of the Public Utilities Act by the respondent. This Commission is without jurisdiction to sanction or permit violations of law or of its decisions. Therefore, any order by this Commission dismissing or suspending this proceeding would be beyond its jurisdiction and would result in operations by the respondent in violation of this Commission's decisions and, consequently, in violation of law.

The Commission therefore finds that the motion to dismiss should be denied.

ORDER

It is therefore *ordered*, by the Commission, that the respondent's motion to dismiss or suspend is hereby denied, and the respondent is granted ten days from this date in which to file its written answer to the complaint herein.

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Industrial Progress

Selected information about manufacturers, new products, and new methods. Also news on utility expansion programs, personnel changes, recent and coming events.



Gas Utility Erects Unique Storage Plant

A NEW \$1,000,000 gas storage project, which provides, in three spherical tanks, a storage capacity equivalent to one hundred and fifty conventional gas holders was made practicable by arc welded construction at the plant of a midwest gas company in Cleveland, Ohio.

The unique feature of this new project is the reduction ratio of 600 to 1 in liquefaction. In employing the cascade refrigeration process, the new plant stores the gas at extremely low temperatures, (248 to 250 degrees below zero), thus introducing new metallurgy.

The storage tanks consist of three arc welded alloy steel spheres 57 feet in diameter, 70 feet high overall, each sphere having a storage capacity of over 50,000,000 cubic feet. Each sphere is supported by 12 columns fabricated of wide flange rolled steel sections.

Each sphere is, in reality, two spheres in one. Within an outer shell and separated from it by 3 feet of cork insulation is a nickel alloy steel sphere in which the gas is actually stored. This inner sphere actually "floats" upon the cork insulation, a feature which allows "working" during expansion and contraction.

Erection of these three spheres represents a new industrial advance made practicable by welded construction.

The Gas Machinery Company, Cleveland, Ohio, was the general contractor for the project and Pittsburgh-Des Moines Steel Company of Neville Island, Pa., were the sub-contractors for the fabrication and erection. The welding was done utilizing the shielded arc process with most of the equipment supplied by The Lincoln Electric Company, Cleveland, Ohio.

Egry Expands Engineering Dept.

THE Egry Register Company, Dayton, Ohio, announces the expansion of its business forms engineering department.

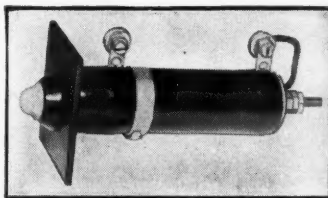
By careful analysis of systems and forms requirements, Egry form engineers have been

able to accomplish many time-, labor- and money-saving improvements, not only in the actual form itself, but in its functions and routing in the users' business.

An attractive brochure has just been received, showing in detail how the department carries on its work, reproductions of old and revised forms, and the profitable results of such forms engineering service to the user. A copy of this brochure will be sent by The Egry Register Company on request.

Compact Indicating Lamps

AN improved line of indicating lamps for visual or pilot light indication on switchboards, switchgear, panels and controls has been developed by the Allis-Chalmers Mfg. Co., Milwaukee, Wisconsin. These rugged lamps are compact, simple in construction, and require very little panel space for mounting.



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An outstanding feature is the use of special material in the color cap which allows less lamp voltage with equal brilliance and corresponding longer lamp life consuming only approximately 4 watts. The color caps are threaded and easily removed and replaced from the front of the board.

Binding screws provide easy means for making connections. The lamp slips into the receptacle from the front after the color cap is unscrewed. The lamp bulb may be removed or replaced without the use of tongs, wrenches, pullers or other tools.

G-E Improves Distance Relay

AN improved Type GCX distance relay which incorporates many new features for the simplification of testing and maintenance has just been announced by the Switchgear Division of the General Electric Company at Philadelphia. New factors include a timing unit with a cast metal base in which mounting bases and bearing supports are brought to-

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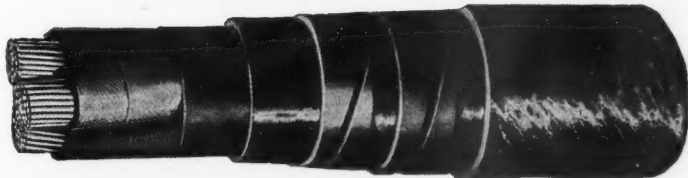
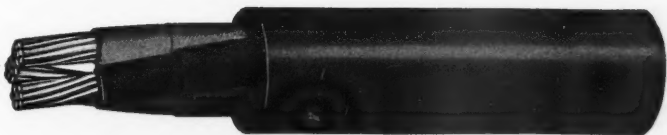
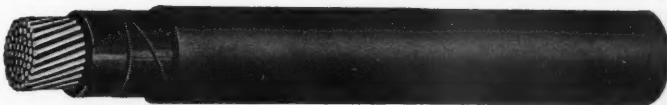
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Electrical Wires and Cables

A FEW OF WHICH ARE ILLUSTRATED HERE



CRESCENT INSULATED WIRE & CABLE CO.



CRESCENT

WIRE and CABLE

Factory: TRENTON, N. J.—Stocks in Principal Cities

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gether into a single unit, thus insuring a more positive alignment of parts and simpler testing and maintenance of gear meshes and bearing clearance. All this results in permanent timing characteristics.

The new types of relays include both 3-phase and single-phase forms, with or without over-current units, also a 3-phase ground fault form.

New Types Aerial Cable

Two new types of self-supporting aerial cable for use on urban, suburban, and rural power circuits in place of bare weatherproof, tree wire, or cable on messengers, have been added to the General Electric line. The new cables, designated "SS," are of the 4- and multiple-conductor type, supplementing the two-conductor type recently introduced.

The characteristic and distinctive feature of the "SS" line is its outer covering, consisting of galvanized steel wires for mechanical strength, interwound with electric conducting wires of copper.

The two-conductor type is for single-phase circuits with one side grounded, from 4,000 up to 15,000 volts. The four-conductor type is for three-phase, four-wire circuits with grounded neutral, up to 5,000 volts. Each of these types has No. 1799 varnished-cambric insulation, with the ground-return conductor in the outer covering.

The multiple-conductor type is used for telephone, supervisory, and other control circuits. The size most generally used is No. 16 Awg stranded, ranging from four to ten conductors. The insulation is Thinwol, an 85 per cent new-rubber insulation with high dielectric strength. The interwound armor of the multiple-conductor type is used only for suspension and mechanical protection.

Folding Iron for Travelers

FOR every ironing and pressing use where a regular electric iron is impractical, Knapp-Monarch Co., St. Louis, Mo., presents the K-M Gad-A-Bout, a light-weight, streamlined electric iron, designed by Dave Chapman. For the cruise vacationer, the cross-country tourist, the resorter, and for all travelers and vacationers, this iron with the folding handle slips easily into a brown suede fabric case for convenient packing and carrying. Equal to the work done by any ordinary electric iron, the Gad-A-Bout has a visible heat indicator, patented embedded element, chromium finish, and an attractive plastic handle. Complete with a separable cord set and case, it lists for \$4.95.

70 MASTER-LIGHTS

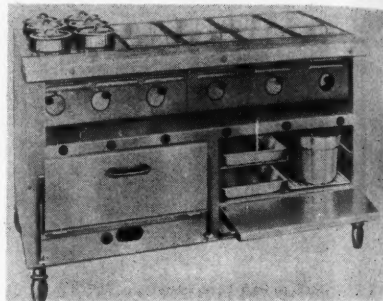
- Electric Portable Hand Lights.
- Repair Car Spot and Searchlights.
- Emergency (Battery) Floodlights.

CARPENTER MFG. CO.

179 Sidney St., Cambridge, Mass.
MASTER-LIGHT MAKERS

Waterless Gas-Heated Server

A SPECIAL Series "A" Sectional Control Thermolator waterless gas-heated hot food storage and serving table together with surplus food storage compartments built into the base of the fixture, is announced by Ershler & Krukin, Inc., Bayonne, N. J.



Efficient Hot Food Serving Table

The upper unit consists of a dry-heat hot food serving table with a recessed shelf below the carving board for the storage of plates during serving periods. Each section has its individual burner pilot and indicating valve and may be obtained with or without visual thermostatic control. Because of this construction sections may be operated independently during off periods. Operating temperatures are reached quickly after heat is applied. Water pans, steam and waste connections are eliminated making installation unusually flexible.

The lower compartments are fitted with removable shelves accommodating two large-size meat pans or a number of soup or vegetable insets. These compartments are desirable for the storage of surplus cooked foods required during peak periods. The standardized insets may be taken directly from these compartments and set into the top openings for serving. Fitted with an adjustable control, gas burning arrangement, similar to the type used in the upper compartments, these compartments retain foods at the proper serving temperatures. Drop doors, form a continuation of the bottom platform, preventing spillage.

Connelly Extends Contest

THE photographic contest sponsored by the Connelly Iron Sponge & Governor Co., Chicago, originally scheduled to end June 30th, will be extended to August 31st. The purpose in granting this extension is to give an opportunity to many who have signified their desire of entering the contest to take suitable photographs.

Started April 1st, the contest is open only to employees of gas companies and their families. Seventeen cash prizes totaling \$255 are offered for photographs judged best in several different classifications. These prizes include a grand

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JULY 3, 1941



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Acting as a supplement to the utility's own research department, E.T.L. stands fully prepared to test new equipment against specifications either at the Laboratories, *at the factory*, or in field surveys.

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Battery Life

Wheat Spotlight

A "MUST" on the National Defense Program:-

*Complete Protection of
Public Utility Plants*

In carrying out this important task and for all emergencies and routine work specify

WHEAT Rechargeable Spotlight

for watchmen, maintenance and repair crews. Carried by hand or shoulder strap. Flood light reflector available. Write for folder and prices.

KOHLER MANUFACTURING CO.
Marlboro, Mass.

prize of \$100 for the photograph which the judges decide is the best of all submitted regardless of classification.

For further information write to Mr. R. W. Stafford, contest manager, Connelly Iron Sponge & Governor Co., Chicago, Ill.

New Fluorescent Lamp Plant For Hygrade Sylvania

A \$500,000 fluorescent lamp plant is being erected by the Austin Company at Danvers, Mass., for Hygrade Sylvania Corporation, according to F. J. Healy, vice president of the company and general manager of its Lamp Division.

The tremendous demand for fluorescent lighting in plants engaged in National Defense work as well as in other industrial and commercial fields overburdened the company's Salem, Mass., manufacturing facilities and necessitated the Danvers plant, Mr. Healy stated.

To be a two-story brick-on-steel structure of ultra modern design with about 100,000 feet of floor space, the new factory building will be ready for occupancy in the fall. It will be geared for a production capacity of over 100,000 fluorescent lamps per day, and all fluorescent lamp manufacturing operations now being conducted at the Salem plant will be removed to this new building at Danvers when completed.

"Office On Wheels"

MARMON - Herrington All - Wheel - Drive Trucks and Track-Laying vehicles built at Indianapolis, Indiana, are tested over types of terrain approximating as closely as possible that over which they will have to operate. In a great many instances the scene of such tests is many miles from the company's offices and plant.

For the convenience of visiting dealers and customers, and for facilitating the work of military officials and commissions in observing these tests, Marmon-Herrington has recently placed in service a deluxe trailer which is equipped with every modern convenience. Designed and built to Marmon-Herrington's specifications by Schelm Bros., Inc., of Peoria, Illinois, the trailer is in fact a mobile kitchen, diner and club lounge in which passengers can spend an entire day away from conventional facilities. Accommodations are provided for twelve passengers, and a steward-chef is in charge.

The trailer is pulled by a Marmon-Herrington All-Wheel-Drive converted Ford with a shortened wheel base, and a steel box at the rear of the cab is equipped to carry all necessary provisions and supplies.

Philadelphia Adds 110 Cars

THE Philadelphia Transportation Company is adding 110 modern, streamlined street cars to its equipment, only a few months after 130 of them were put into operation there.

In the summer of 1938 the company started operation of 20 such cars on Route 53. Schedule speed was increased 15 per cent; there was an immediate increase in receipts, despite a slight decrease for the system as a whole, the net improvement being more than 16 per cent. Eighty cars were recently placed in operation on Routes 13 and 42, and 50 of them on Route 56. Ninety of the newest ones will be used on Route 23 and the other twenty will take care of traffic increases on Routes 13, 42 and 56.

Equipment Literature

Accounts Payable Procedure

"The Magic 12 in Accounts Payable Procedure" is the name of a folder recently released by The Todd Company, Rochester, N. Y. Devoted to a description of the way in which Todd blue streak voucher checks promote efficiency and eliminate the hazard of financial loss in the payment of invoices, the copy lists twelve essential benefits created by voucher checks.

Containing a brief and clearly written summary of an ideal accounts payable procedure, it is well illustrated and printed on heavy paper. The folder will gladly be sent on request. Address The Advertising Department, The Todd Company, Rochester, N. Y.

Filing Cabinets

All steel filing cabinets of the non-suspension and suspension types are described in a 4-page circular issued by the American Metal Products Corp., St. Louis, Mo. The folder illustrates both types of files and explains the special construction features. The 4-drawer files are 24½ inches deep and 52 inches high. Drawers operate on anti-friction rollers, the rear rollers operating in a channel prevent the drawer from sagging when fully extended. All steel files are built in letter and legal sizes with various drawer combinations, locks, olive green and photographic wood grain finishes.

Combination Rubber and Friction Tape

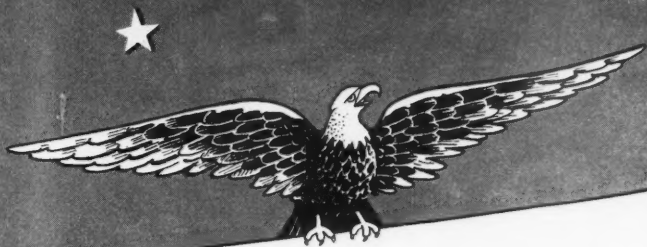
Two-in-One tape, as its name implies, is a combination of two products into one. Developed by The B. F. Goodrich Co., Akron, Ohio, this tape is described in a recent bulletin. It is made with rubber insulation on both sides of a strong cotton tape. It is useful in all branches of the electrical industry for inside and outside work and does away with the double operation of using "splicing compounds" and friction tapes when joining electric wires.

Mitchell Fluorescent Fixture

A new high intensity fluorescent fixture designed to provide more and better light is announced in Bulletin No. 238 issued by the manufacturer, the Mitchell Manufacturing Company of Chicago.

The new unit is No. 2025 employing two 100 watt, 60 in. fluorescent lamps. Built of extra heavy gauge sheet steel throughout, the unit

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national defense and service . . .

Our American form of government was created to insure a more perfect union, "establish justice, . . . provide for the common defense, . . ." Today, the biggest job before the nation is common defense. The present emergency calls for understanding, cooperation and willingness to work and sacrifice. It is the job of American Industry to coordinate all its efforts and ingenuity towards producing the material and equipment necessary for the defense of THE AMERICAN WAY.

We fully realize the importance and enormity of the job ahead and the necessity for speed and efficiency. We aim to give the quickest and most reliable service that is in keeping with the high quality of our product.

To this end we pledge ourselves to unremitting efforts to help meet the needs of this emergency. WE WILL DO OUR PART!

Pennsylvania TRANSFORMER COMPANY

PITTSBURGH, PA.

Pennsylvania
TRANSFORMERS

Equipment Literature (Con'd)

has a white vitreous porcelain enamel reflector that provides unparalleled foot candle power. The unit has open ends and is readily adaptable for continuous strip mounting. It is corrected for high power factor and stroboscopic effect. Latest, approved ballasts, starters and sockets are used and the fixture has Fleur-O-Lier and Underwriters' Laboratories certification. The unit is shipped completely wired with heavy duty cord and plug ready to install. Hanging chains are included. Baked enamel reflector is optional. Information is obtainable through leading wholesale electrical supply distributors.

The Labor Saver

The current issue of *The Labor Saver* (Vol. 187) published by Stephens-Adamson Mfg. Co., Aurora, Ill., describes a method of effective straining of water for power plants. A west Texas utility company keeps schools of small fish and other foreign materials out of the power plants intake water by a system of two S-A traveling water screens.

This issue also tells how another utility company effected savings by revamping its unloading and storing system to handle coal from barges instead of rail cars.

Manufacturers' Notes*Cochrane Appointment*

The Cochrane Steam Specialty Company, Boston, announces the addition of Samuel Reid to the organization. Mr. Reid will be actively engaged in sales engineering work, handling the well known products of Cochrane Corporation, The Hays Corporation, Northern Equipment Company, Reliance Gauge Column Company, and Vulcan Soot Blowers.

Elliott Promotions

Among recent changes in the general office and sales organization of the Elliott Company, Jeannette, Pa., are the following:

L. M. Forncrook, vice president and manager of the Jeannette plant, is now vice president in charge of operations at the company's three plants, in Jeannette, Pa., Ridgway, Pa., and Springfield, Ohio.

V. H. Peterson, general sales manager, has been elected a vice president in charge of all sales, advertising and service activities.

L. E. Nohl, member of the Board and of the Executive Committee, has been elected a vice president and will be responsible for all financial and accounting functions.

W. A. Elliott, member of the Board and of the Executive Committee, and manager of the Chicago district office, is now a vice president in charge of market research, field studies, and the administration of purchasing.

M. A. King, for the past nine years manager of the turbine department, has been appointed manager of engineering.

J. R. McDermet continues as chief engineer.

W. A. Yost is now manager of the turbine sales department and R. N. Williams is manager of the blower sales department.

J. P. Stewart is manager of the newly created supercharger sales department, which will handle turbo-chargers and blowers for Diesel application.

Sprague Meter Co.

Miss E. L. Ballou, supervisor of sales, Sprague Meter Co., Bridgeport, Conn., and E. R. Meade, former vice president of the Standard Oil Company, Buenos Aires, Argentina, S. A., were recently elected to the board of directors of the Sprague Meter Co.

M. M. & M. Add Sales Personnel

Additional sales personnel has again been announced by Manning, Maxwell & Moore, Inc., of Bridgeport, Connecticut. Mr. Leo W. Dillon has just joined the organization to cover the Kansas City territory. Mr. Herman M. Munson will work in the Chicago district. Mr. Frederick W. Chadwick will make his headquarters at Syracuse, New York. His territory will cover central New York and northern Pennsylvania.

Edwin H. Price, Los Angeles representative, is now Lt. Commander, U.S.N.R., and is assistant supervisor of shipbuilding at the Union Iron Works plant of the Bethlehem Shipbuilding Corporation at San Francisco. He has received a leave of absence from his sales duties for the period of time that his services are required at this highly important post.

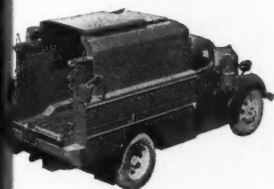
Easy Washer Appoints Reeve

The appointment of W. Homer Reeve as acting sales manager of the Easy Washing Machine Corporation, to take over the duties of J. J. Nance, who has resigned as vice president in charge of sales, was announced recently by J. C. Nelson, president of the company. For the last two years, Mr. Reeve has been in charge of the company's major dealer development program.

A new automatic washer is being developed by the company. Molds, tools and dies are being released to provide substitutes for aluminum, zinc and other materials affected by priorities. The company's production facilities have been expanded and additional overtime schedules have been put into effect to meet the increased sales volume.

DICKE TOOL CO., Inc.**DOWNERS GROVE, ILL.***Manufacturers' of***Pole Line Construction Tools*****They're Built for Hard Work****Mention the FORTNIGHTLY—It identifies your inquiry*

Goodwill... Begins at Home



Nothing will promote goodwill and rebound to your ultimate profit like providing your construction crews with American DeLuxe Line Construction Bodies. Men are happier and work better when their comfort is amply provided for. There is a place for everything, easy of access, but no place for unnecessary articles—overloading is discouraged. And in American Bodies, safety has been provided for in every detail of construction.

THE AMERICAN COACH & BODY CO.

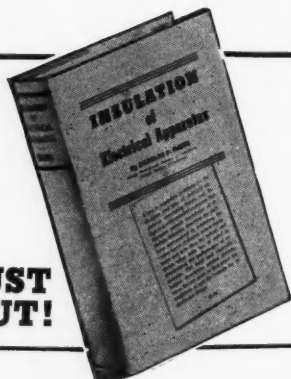
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for Public Utilities*

**Now...the complete, one-volume key
to the engineering essentials of**

INSULATION

—kinds, applications, testing, theory



**JUST
OUT!**

This book will help

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ENGINEERS in mechanical, chemical, or other fields who need to know something about insulation of electrical apparatus

MAINTENANCE and REPAIR MEN who want to know more of the reasons back of their work

PURCHASERS of electrical equipment who need to know how to detect quality or lack of it and what to put into specifications

18 full, explicit, authoritative chapters cover:

1. Dielectric Phenomena
2. Theories of Dielectric Behavior
3. Factors Affecting Dielectric Behavior
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7. Control Apparatus
8. Transformers and Reactors
9. Circuit-breaker Principles
10. Circuit-breaker Constructions
11. Transmission-line Insulators
12. Lightning Arresters
13. Capacitors
14. Heating Appliances
15. Lamps and Tubes
16. Meters, Instruments, and Relays
17. Insulating Testing
18. High-voltage Testing Equipment

HERE is a new and helpful guide for all concerned with the design and use of electrical apparatus—a book that covers all aspects of its insulation—concisely reviews the theory—describes and compares the materials—and gives complete details of the insulation problems present in all types of electrical apparatus and how they are solved.

INSULATION OF ELECTRICAL APPARATUS

By Douglas F. Miner

*George Westinghouse Professor of Engineering
Carnegie Institute of Technology*

450 pages, 6 x 9, 306 illustrations, \$5.00

This book bridges the gap between the more theoretical treatments of dielectric phenomena and the needs of engineers and designers for data on present-day insulation practices.

From it the reader can get everything necessary to an intelligent approach to insulation problems—the correlation of the theoretical and the practical—plus many facts and data to help in design or selection of electrical apparatus.

The section on applications is presented in great detail—covers many specific types of apparatus breaking each one down to show every insulation requirement and best practices in handling it.

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Munsey Building, Washington, D. C.

Please send me a copy of Miner's **INSULATION OF ELECTRICAL APPARATUS** postpaid. I enclose \$5.00 in check..... money order..... cash.....

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City and State



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\$10,000 for a NORDSTROM!"

The valve on our main high pressure gas transmission line hadn't been closed for months. Torrential rain had undermined the line at the outskirts of the town. The line broke and the town was in jeopardy, gas belching forth. I phoned to close the main valve. Back came the ominous report. 'It's frozen. Can't turn it off.' I had to send men miles down the line to the next cut-off. Right then I would have paid \$10,000 for a Nordstrom. Fortunately, we got the line under control after a tortuous delay. It taught us a lesson. We've replaced those old valves with Nordstroms all along our various lines."

Emergency shut-offs are bound to occur. Nordstrom Valves are always easy to turn, either constantly or as infrequently as once a year. A single valve will hold the line pressure as tightly as though the line was blanked off. A quarter-turn means instant operation. Equipped with remote control, a Nordstrom can be operated miles away. *Ask for Bulletin.*

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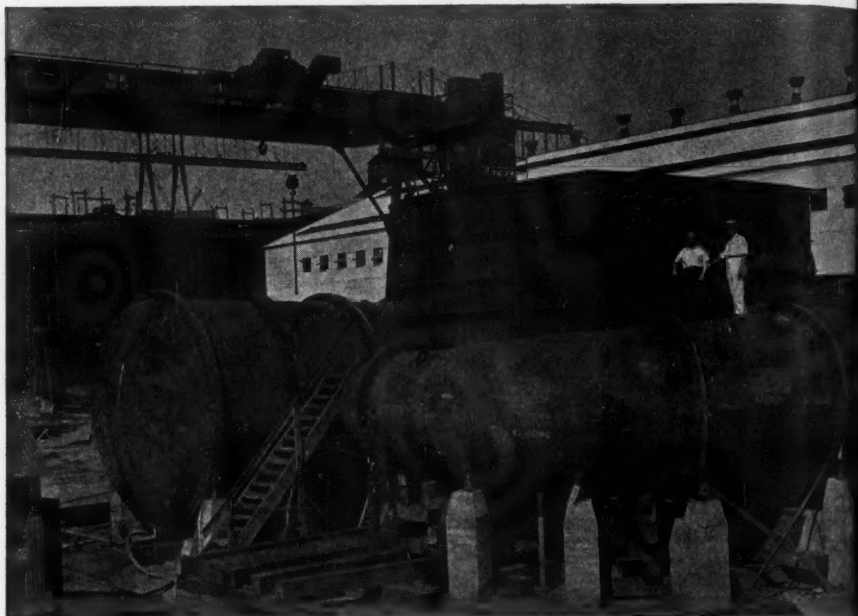
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(SHOP HYDROSTATIC TEST—230 LB. PER SQ. IN.)

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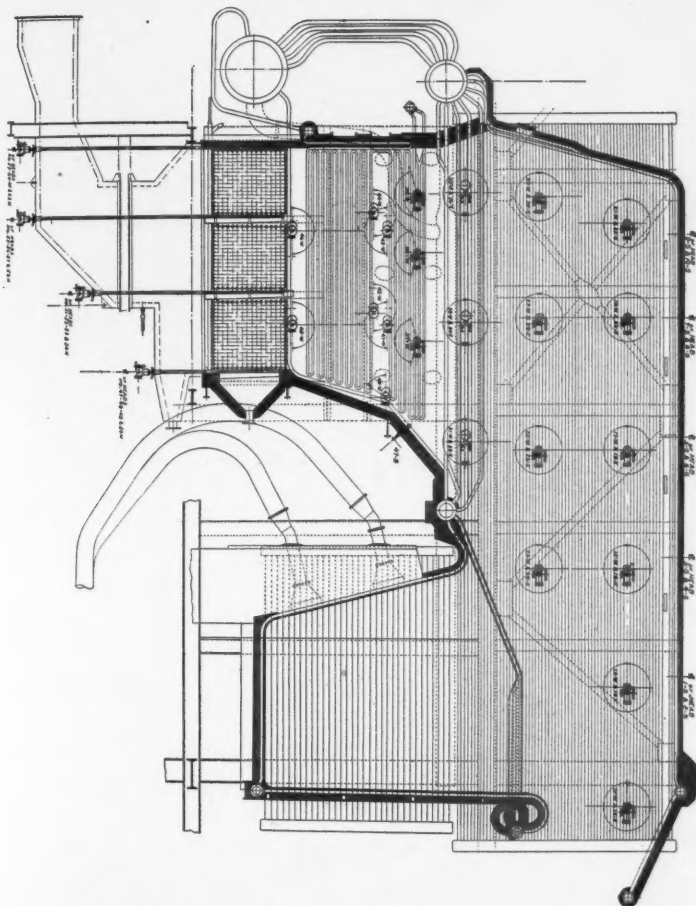
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1350 LBS. PRESSURE

PULV. COAL FIRED
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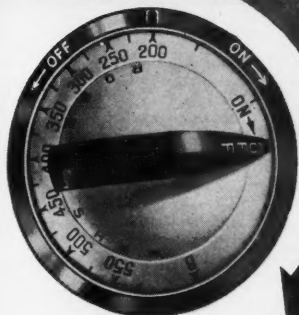
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THE SIMPLEST WAY IS THE BEST WAY!



ONE motion turns gas on full and sets control



ONE motion turns gas off and returns control to zero

THE ROBERTSHAW WAY IS THE SIMPLEST WAY!

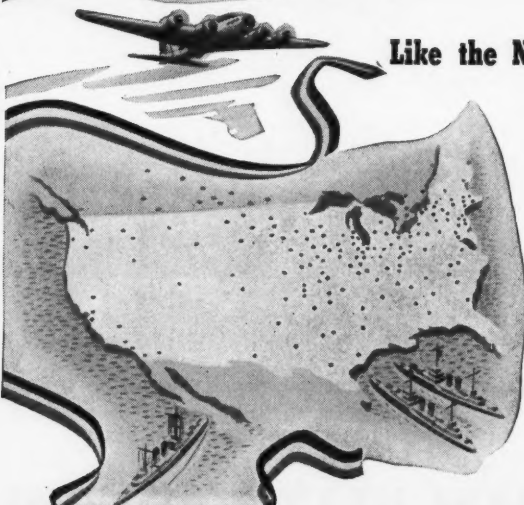
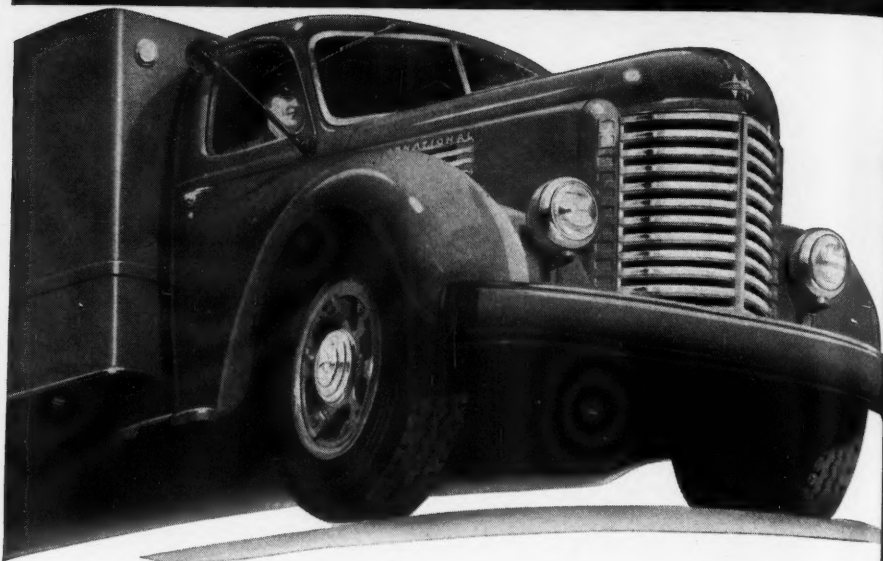
Accurate! Each time oven is used, thermostat must be set. **Quick!** Quick operation, quick ignition, quick selling, quick servicing. **Exclusive!** Only Robertshaw heat controls offer the many advantages of modern simplification.

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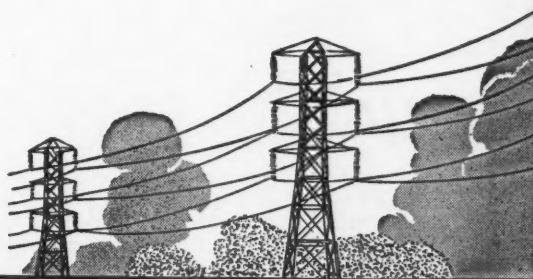
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Transmission line construction costs can be materially reduced and completion expedited by using Hoosier Crews

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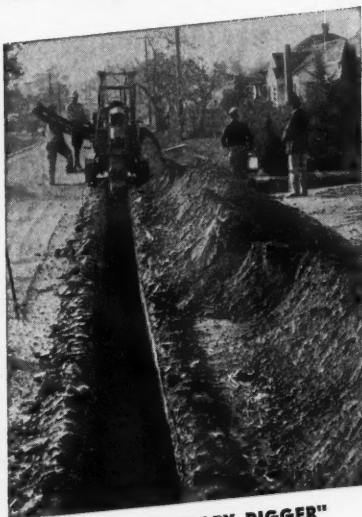
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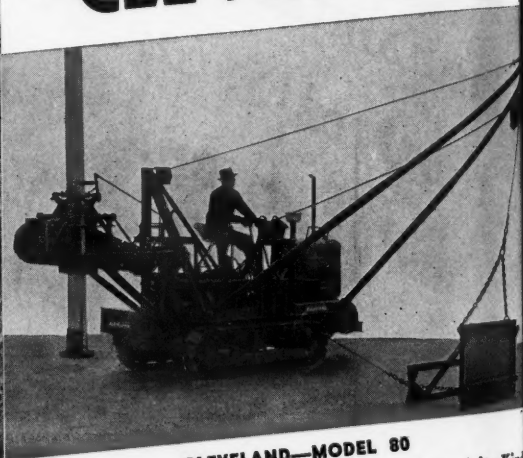
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THE WAY TO MORE SAVINGS ON ALL YOUR TRENCHING JOBS. DIG-BACKFILL-TAMP with "CLEVELANDS"



CLEVELAND—"BABY DIGGER"
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New—Distinctive—Different—The Only Machine of its Kind Performs 3 important operations—Backfills—Tamps—Lays Pipe.

WITH the two "CLEVELANDS" illustrated here you will save money on your trenching jobs from the breaking of ground to the last foot of earth tamped.

Time-tested, time-proven, compact, fast, flexible, streamlined for light weight—easy to move around the job, easy to move around the country, yet rugged and abundantly powered, these "CLEVELANDS" have the built-in qualities that enable you to get your pipe in the ground quickly, with least "times-out" and at lowest cost. Don't delay—get the details—Write today.



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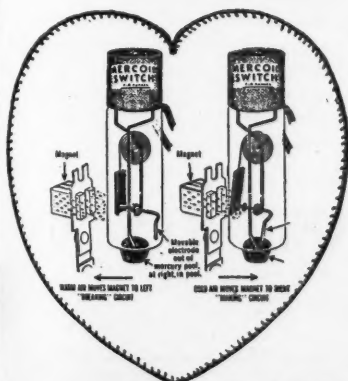
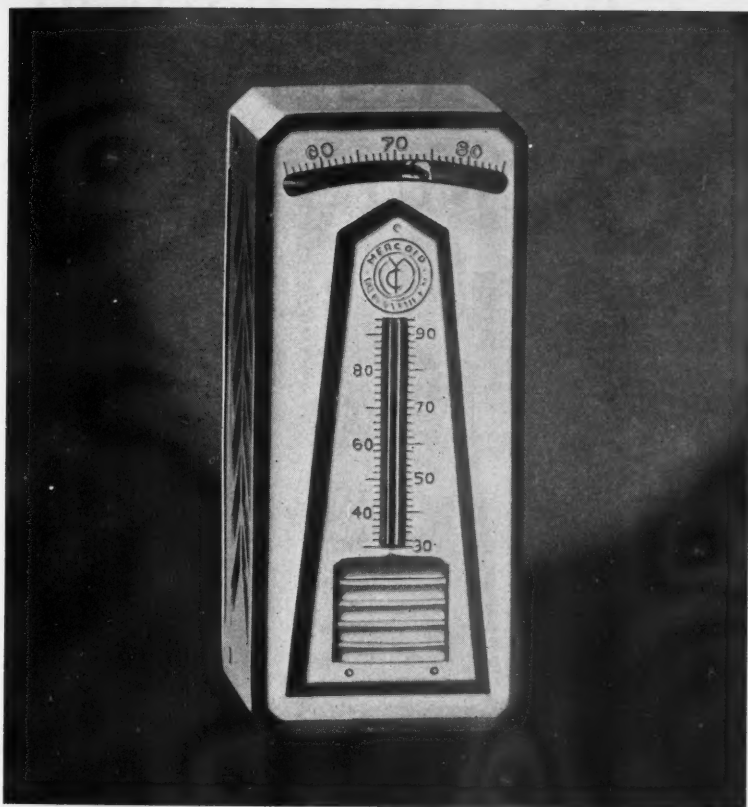
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There is no mystery in the growing acceptance of the Mercoid Sensatherm. It can be accounted for in the recognition throughout the heating industry that here is a thermostat whose built-in qualities fit it for the field it serves. • The Sensatherm is of small mass. We build it that way to meet the requirements of sensitivity. Thus it responds quickly to the true room temperature changes. No artificial stimulant is necessary. Its own accuracy as a heating system pilot is a matter of record to everyone who is familiar with this outstanding instrument.

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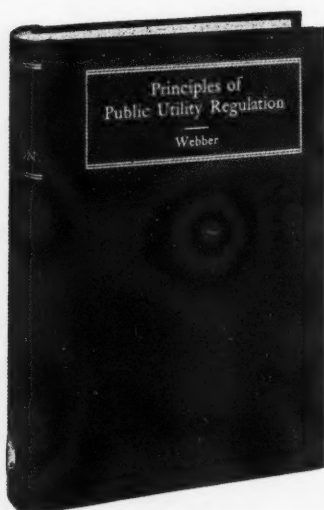
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PRINCIPLES of PUBLIC UTILITY REGULATION

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A. C. WEBBER

*Former Chairman and Commissioner
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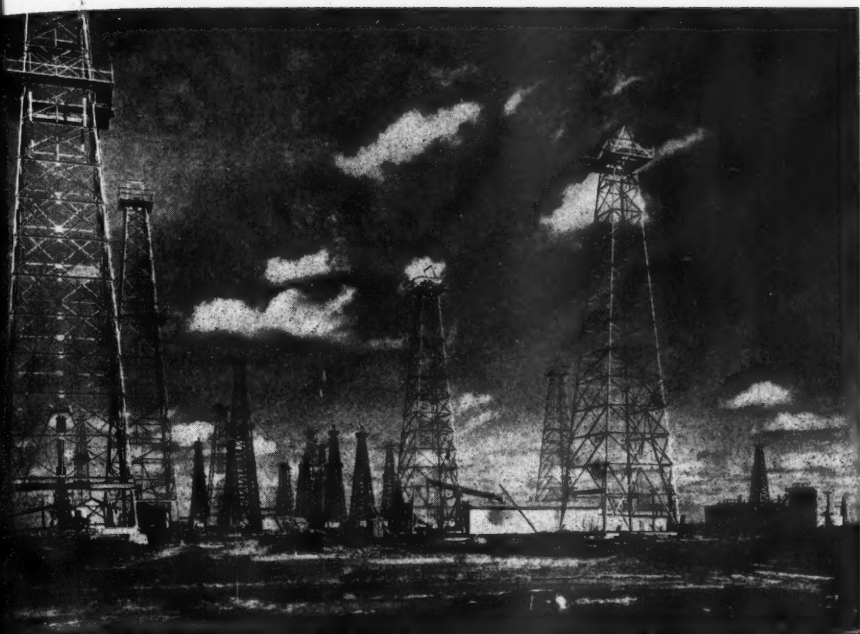
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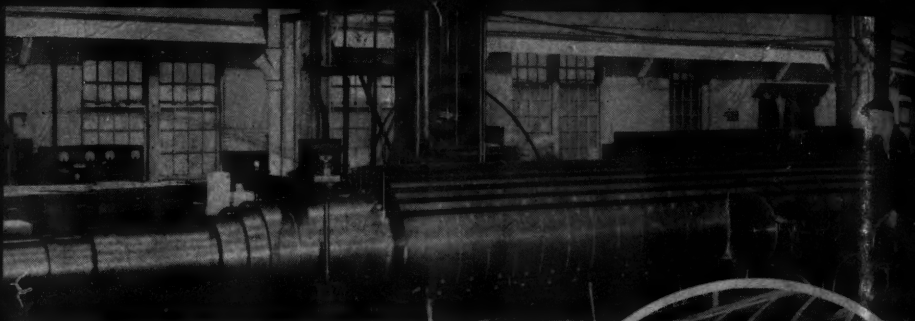


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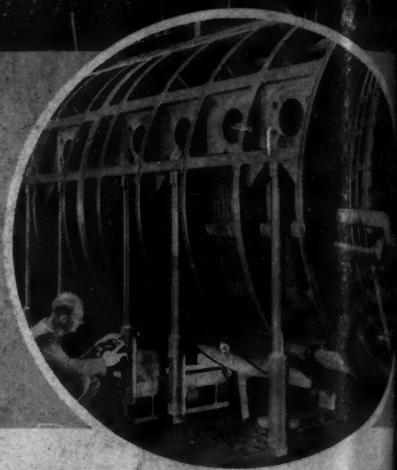
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